BOSTON PUBLIC LIBRARY
3 9999 08719 647 1

NDERS
39
H ST.
MASS.
MAIN

No. 3761.10

1912
V.1

GIVEN BY
Boston, Health Department.

22574-1913

By sending these figures this order can be duplicated.

CITY OF BOSTON—PRINTING DEPARTMENT

No. 251 CAUSEWAY STREET,

BOSTON, MASS.

21

Boston Public Library

Do not write in this book or mark it with pen or pencil. Penalties for so doing are imposed by the Revised Laws of the Commonwealth of Massachusetts.

This book was issued to the borrower on the date last stamped below.

FORM NO. 609; 6,12,33; 575M.

Vol. 1 JANUARY, 1912 No. 1

22174

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF THE

CITY OF BOSTON

	Page
Foreword	3
Prevention of Infant Mortality by Breast Feeding	4
Vital Statistics, January, 1912	10
Monthly reports	22

CITY OF BOSTON
PRINTING DEPARTMENT
1912

376.1.10
Boston. Health Department
Mar. 3. 1913
Vol. 1

ORGANIZATION OF THE HEALTH DEPARTMENT.

SAMUEL H. DURGIN, M. D., *Chairman.*
FRANCIS X. MAHONEY, M. D.
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

ALLIED PRINTERS TRADES UNION LABEL COUNCIL BOSTON, MASS.

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, JANUARY, 1912. NO. 1.

FOREWORD.

A monthly bulletin has been issued by the Board of Health for many years, under the title, "Statement of Deaths."

It has seemed best to change this bulletin to the more convenient size, 6 by 9 inches, and to broaden out its scope so that it may more clearly present the monthly work of the Department. Following this policy, there will be published from time to time in this bulletin new regulations, statements from the Board and papers by those connected with the Department.

PREVENTION OF INFANT MORTALITY BY BREAST FEEDING.*

By William H. Davis, M. D.

Vital Statistician of Boston Board of Health.

Much has been said from time to time in favor of breast feeding of infants; and statements have been made that 80 or 85 per cent of infant deaths occur among bottle-fed babies. But such statements have lacked force because it has not been apparent how many mothers nurse their babies and how many bring them up on the bottle.

If 80 per cent of infant deaths occur among bottle-fed babies, and if it should be found that 80 per cent of all babies are bottle fed, then there would be no case at all against bottle feeding.

In order to find out the percentage of babies that are bottle fed, the Boston Board of Health recently sent about 900 letters to mothers who had births recorded within the past year. Care was taken to select proportionate numbers of babies of various age periods, namely, two weeks to one month, one to three months, three to six months, six to nine months, and nine to twelve months, and to select proportionate numbers of babies from the various wards and from the various mother nativities,— the number of births in 1910 in the various wards of various mother nativities being taken as the basis for these proportions. Aside from obtaining the proportionate numbers of babies in the way just indicated, care was taken not to select these babies in any way but to take them at random from the birth returns furnished by the Registry Department. The circular sent to each mother was as follows:

Dear Madam,— To assist the Board of Health in its campaign to save the babies of Boston, will you please answer the following questions regarding your child and return this slip at once in the inclosed envelope.

Is this child breast fed? (Answer yes or no.)

How long was it breast fed?

Is this child bottle fed? (Answer yes or no.)

How long has it been bottle fed?

If bottle fed, what food has been used?

* Read at annual meeting of Massachusetts Association of Boards of Health, Boston, Jan. 25, 1912.

Replies were received promptly from over half of the mothers addressed, and an additional 200 replies were obtained through the Board of Health nurses, who went to the homes for the information.

Table I. gives the results of this investigation — the number of replies received for babies of various ages and mother nativities and the percentages of breast and bottle fed babies.

The number of replies was 736, of which 533, or 72.4 per cent, were breast fed and 203, or 27.6 per cent, were bottle fed. But the information thus obtained is only for living children. To determine what proportion of all babies are bottle or breast fed, it is necessary to add a proportionate number of the deaths of 1911. These necessary additions are given in Table II. Adding the figures in each square of Table II. to the figures in the corresponding square of Table I., totals may be obtained which show the relative proportions of breast and bottle fed babies in Boston. The corrected percentages shown in Table II. were thus obtained. At various places in the table there appear higher percentages of breast feeding for the older babies than for the younger. This, of course, is an error due to too few replies and would be rectified if answers from all the mothers of 1911 could be tabulated. But the evidence furnished by these 736 replies is very striking and may be used for present calculations.

Italy leads, with 83 per cent breast fed; Russia and Poland come next, with 79 per cent breast fed; Ireland and the United States follow, with 73 per cent and 59 per cent, respectively; while Canada makes the poorest showing, with only 51 per cent breast fed. The replies from mothers born in England, Scotland and Wales, Germany and Scandinavia were too few to warrant any estimate for the babies of these mother nativities.

Table III. gives for 1911 the total mortality of infants by age, by mother nativity and by feeding (for infants over two weeks of age).

Table IV. gives for 1911 the total mortality of infants by month, by age and by feeding (for infants over two weeks of age).

Notice in Table IV. that there is only a slight increase of deaths among breast-fed babies during the summer months. July, August and September, with 39 and 40 such deaths each month, are lower than February, March and April, with 49, 41 and 38 deaths, respectively. The number of deaths among bottle-fed babies, however, jumps up tremendously in July, August and September.

Table III. shows that only 26 per cent of infant deaths between the ages of two weeks and one year occur among breast-fed babies. And of infants over two weeks old, born of native mothers, only 16 per cent of the deaths occur among breast-fed children; while of babies over two weeks of Italian mothers, 53 per cent of the deaths occur among breast-fed children.

Bottle-fed babies between the ages of one and three months show the highest mortality, especially those babies having mothers born in the United States.

Interesting and instructive as the foregoing figures and rates may be, ten times more interesting and instructive are the estimates which can be obtained from those tables. Many such estimates are tabulated in Table V.

If 74 per cent of infant deaths above the age of two weeks are among bottle-fed babies and only 32 per cent of babies over two weeks are bottle fed, then the bottle-fed infant over two weeks old is six times as likely to die as the breast-fed infant.

Again, if all the infants above the age of two weeks had been breast fed, or equally well fed (for it is by no means proven that bottle feeding may not be so safeguarded that the mortality will be no greater than among breast-fed babies), there would have been only 1,253 infant deaths last year, while if all had been bottle fed there would have been 4,352 such deaths.

The actual number of infant deaths last year was 2,245, which gives a rate of 127 per thousand births.

Breast feeding of all babies would have saved nearly a thousand lives last year, and the death rate per 1,000 births would have been 71 instead of 127.

There would have been 470 less deaths among the children of native mothers; 161 less deaths among the children of Irish mothers; 97 less deaths among the children of Canadian mothers; 87 less deaths among the children of Italian mothers; and 85 less deaths among the children having mothers born in Russia and Poland.

A large part of this saving of infant life is to be expected in the great reduction of deaths from diarrhea and enteritis. Of 621 deaths from diarrhea and enteritis last year between the ages of two weeks and one year, 87 were breast fed and 534 bottle fed; *i. e.*, 86 per cent were bottle fed. If all the babies had been breast fed the estimated number of these deaths would have been 493 less than actually occurred.

These figures are so startling that I feel that this investigation ought to be continued till 5,000 or 10,000 replies have been received from mothers, so that no opportunity be given to criticise the figures on the score of paucity of data.

These estimated rates measure the possible reduction in infant mortality if all babies could be breast fed, and they also show in what nationalities most of the improvement is to be expected.

Such a saving of infant life is not a mere fancy. The reduction of the infant mortality rate from 127 to 71 is entirely within the range of possibilities.

New Zealand in 1909 had a rate of 62 and South Australia for the same year had a rate of 61.

TABLE I.

Living Babies — Breast or Bottle Fed.

Mother Nativity.	Total Replies.													Percentage Breast Fed.
	2 weeks to 1 year.	2 weeks to 1 year.		2 weeks to 1 month.		1 to 3 months.		3 to 6 months.		6 to 9 months.		9 to 12 months.		
		Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	
United States	272	174	98	44	8	33	23	42	19	24	29	31	19	64
Ireland	120	93	27	17	1	24	6	23	8	16	5	13	7	77
England, Scotland and Wales	20	15	5	1	....	3	1	4	1	3	2	4	1	.....
Germany	2	1	1	.....	.....	.....	.....	1	1	.....	.....	.....	.....	.....
Canada	69	38	31	5	1	8	7	8	9	8	8	9	6	55
Scandinavia	10	8	2	1	.....	1	1	2	....	3	1	1	.....	.....
Italy	123	106	17	24	2	23	4	23	2	18	2	18	7	86
Russia and Poland	120	98	22	20	2	21	7	21	6	17	6	19	1	82
Totals	736	533	203	112	14	113	49	124	46	89	53	95	41	72
Percentages	.....	72	28	89	11	70	30	73	27	63	37	70	30	.....

TABLE II.

Death Additions to Table I. Necessary to Obtain Corrected Percentages of Breast and Bottle Fed Babies.

Mother Nativity.	2 Weeks to 1 Year.		2 Weeks to 1 Month.		1 to 3 Months.		3 to 6 Months.		6 to 9 Months.		9 to 12 Months.	
	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.
United States	5	27	1	3	1	9	1	7	1	4	1	4
Ireland	3	9	.....	1	1	2	1	2	.....	2	1	2
England, Scotland and Wales	1	1	.....	.....	.....	.....	1	1	.....	.....	.....	.....
Canada	2	7	.....	1	1	2	1	2	.....	2	.....	.....
Scandinavia	.....	1	.....	.....	.....	1	.....	.....	.....	.....	.....	.....
Italy	6	6	1	1	1	1	1	1	2	2	1	1
Russia and Poland	3	5	1	.....	1	1	.....	2	1	1	.....	1
Totals	20	56	3	6	5	16	5	15	4	11	3	8

Corrected Percentages for the Various Age Periods.

	2 Weeks to 1 Year.		2 Weeks to 1 Month.		1 to 3 Months.		3 to 6 Months.		6 to 9 Months.		9 to 12 Months.	
	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.
Percentage	68	32	85	15	64	36	68	32	59	41	67	33

Corrected Percentages of Breast-Fed Infants of Various Mother Nativities.

Children of mothers born in the United States	59
Children of mothers born in Ireland	73
Children of mothers born in Canada	51
Children of mothers born in Italy	83
Children of mothers born in Russia and Poland	79

TABLE III.

1911 Mortality of Infants by Age, by Mother Nativity and by Feeding (for Infants over Two Weeks of Age).

Mother Nativity.	Total Deaths.													Per Cent of Deaths 2 Weeks to 1 Year, Breast Fed.
	Under 1 year.	2 weeks to 1 year.		2 weeks to 1 month.		1 to 3 months.		3 to 6 months.		6 to 9 months.		9 to 12 months.		
		Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	
United States	927	106	544	26	58	20	172	31	144	15	93	14	77	16
Ireland	345	48	179	7	20	16	47	8	53	8	29	9	30	21
England, Scotland and Wales	61	13	25	1	2	4	6	5	10	1	4	2	3	34
Germany	12	3	6	1	....	....	2	....	1	1	....	1	3	33
Canada	232	32	128	5	10	7	40	7	33	7	35	6	10	20
Scandinavia	30	5	15	....	3	2	4	3	4	....	3	....	1	25
Italy	292	124	112	13	13	26	21	21	27	37	32	27	19	53
Russia and Poland	230	60	101	11	8	17	21	11	29	13	23	8	20	37
Other countries	87	21	51	....	1	6	12	5	10	6	18	4	10	29
Unknown	29	1	25	....	1	....	13	1	3	....	3	....	5	4
Totals	2,245	413	1,186	64	116	98	338	92	314	88	240	71	178	26
Percentages	.....	26	74	36	64	22	78	23	77	27	73	29	71	.....

Note: There were four deaths over two weeks where method of feeding was not known.

TABLE IV.

1911 Mortality of Infants by Month, by Age and by Feeding (for Infants over Two Weeks of Age).

Month.	Total Deaths.											
	Under 1 year.	2 weeks to 1 year.		2 weeks to 1 month.		1 to 3 months.		3 to 6 months.		6 to 9 months.		9 to 12 months.	
		Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.	Breast.	Bottle.
January	162	34	64	7	6	10	21	8	20	5	9	4	8
February	175	49	65	8	5	13	17	7	16	13	13	8	14
March	196	41	101	10	8	11	35	7	22	9	27	4	9
April	191	38	102	8	10	9	28	10	23	7	22	4	19
May	181	34	85	7	15	4	22	11	20	5	13	7	15
June	129	21	61	4	8	6	19	3	10	6	14	2	10
July	280	39	184	3	10	8	46	10	46	10	49	8	33
August	260	40	181	5	14	6	40	12	64	8	38	9	25
September	224	40	137	2	16	7	39	10	39	10	23	11	20
October	172	26	86	1	5	9	27	6	28	3	13	7	13
November	138	24	62	3	9	9	24	3	12	5	10	4	7
December	137	27	58	6	10	6	20	5	14	7	9	3	5
Totals	2,245	413	1,186	64	116	98	338	92	314	88	240	71	178

TABLE V.

Actual Death Rates and Estimated Death Rates if All Children had been Breast Fed.

	Mother Nativity.					
	United States.	Ireland.	Canada.	Italy.	Russia and Poland.	Totals for Boston.
Births, 1910	6,226	2,816	1,747	2,703	2,479	17,668
Deaths under one year, 1911	927	345	232	292	230	2,245
Rate per 1,000 births (using the 1910 births)	149	123	133	108	93	127
Percentage of children between two weeks and one year breast fed (estimated)	59	73	51	83	79	68
Deaths, 1911, of children between two weeks and one year	653	227	160	236	162	1,603
Percentage of deaths between two weeks and one year breast fed	16	21	20	53	37	26
Estimated total infant deaths, 1911, if all above age of two weeks had been breast fed	457	184	135	205	145	1,253
Lives saved if all above age of two weeks had been breast fed	470	161	97	87	85	992
Estimated death-rate if all above two weeks had been breast fed	73	65	77	76	58	71
Estimated reduction in death-rate if all above two weeks had been breast fed	76	58	56	32	35	56

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF JANUARY, 1912.

Boston had 1,085 deaths in January compared with 1,068 deaths in January, 1911, the increase of 17 being exactly the number of deaths in the new Hyde Park ward.

But with the increase in the city's population the death rate for January, 1912, is only 17.75, against 18.25 for January, 1911.

Of deaths from reportable diseases, the decreases for 1912 were scarlet fever, 6; whooping cough, 6, and other epidemic diseases, 4; while the increases were typhoid fever, 3; measles, 2, and diphtheria, 9; giving a net decrease of 2 for this group of diseases.

Deaths from all forms of tuberculosis were exactly 121 for each January.

Other important differences were as follows:

January, 1912, Decreases:	
Intestinal obstruction	12
Apoplexy	9
Diarrhea and enteritis (under two years)	8
Bronchitis	5
Cancer	4
Puerperal septicemia	4
January, 1912, Increases:	
Violent deaths	27
Pneumonia	20
Heart and kidney diseases	10
Congenital debility and malformations	10
Cirrhosis	4

The great increase in violent deaths was due to 12 more deaths from conflagration, 6 from burns, and 4 from illuminating gas poisoning. There were no important differences in the number of deaths for the early age periods. The number of deaths under 50 years was the same for both Januarys, but above the age of 70 there were 21 more deaths in January, 1912. Ward 25 had the lowest rate, 9.84, and Ward 4 the highest rate, 25.02, though of the 29 deaths in the latter ward only 3 were due to reportable diseases, whooping cough causing 1 and tuberculosis 2.

With the constantly growing reputation of Boston's surgeons and physicians, greater numbers of nonresidents are coming to Boston's hospitals than ever before. This is plainly indicated by the ever increasing number of deaths of nonresidents. There were 136 such deaths in January, 1912, against 117 in January, 1911. If these nonresident deaths are deducted the rate for the month is only 15.52.

There were marked decreases in the number of cases reported of diphtheria, scarlet fever, tuberculosis and whooping cough, while varicella and measles were more prevalent than a year ago; Ward 2 suffering especially from measles, with 153 cases and 4 deaths.

There were 160 deaths under 1 year, which is 15 less than the average for the corresponding month for the preceding 5 years. Seventy-two of these deaths were due to premature birth, congenital debility and malformations, and other diseases peculiar to early infancy, 39 to bronchitis and pneumonia, 12 to diarrhea and enteritis, 10 to reportable diseases, and 27 to other causes. Wards 6 and 20 suffered most, each with 17 deaths. Of the 160 deaths 100 were over 2 weeks old, 61 over 3 months, and 29 over 6 months. And of the 100 over 2 weeks old, 63 were bottle fed.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
* Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	137.06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston, January 1, 1912, and became Ward 26. Under "Boston," in the above table Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau.

VITAL STATISTICS.

January. General Summary.

	1912.	1911.
Total deaths, January	1,085	1,068
Population, estimated*	720,031	688,912
Death rate per 1,000	17.75	18.25
Deaths of nonresidents	136	117
Corrected death rate†	15.52	16.25

*Population estimated by arithmetical method used by Census Bureau.
†Nonresidents not included.

January, 1912. Statement of Deaths.

Total number (stillbirths excluded)	1,085
Sex.	
Males	577
Females	508
Condition.	
Single	487
Married	363
Widowed	218
Divorced	8
Unknown	9
Color.	
White	1,064
Black (negro or mixed)	20
Chinese	1
Deaths of children:	
Under one year	160
Under two years	199
Under five years	239
Stillbirths during the month,	72

Nativity.	
United States	659
Ireland	179
England and Wales	26
Scotland	13
Germany	20
Canada	95
Italy	31
Russia and Poland	26
Sweden and Norway	8
France	2
Other countries	11
Unknown	15
Nativity of Mothers.	
United States	287
Ireland	338
England and Wales	35
Scotland	26
Germany	35
Canada	107
Italy	92
Russia and Poland	52
Sweden and Norway	11
France	2
Other countries	18
Unknown	82

Abridged List Class Number.	Causes of Death.	Totals. January, 1912.	Totals. January, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes..... 1912	1,085	.....	160	39	16	16	8	239	21	11	18
	1911	.....	1,068	162	43	20	12	6	243	21	9	13
1	Typhoid fever.....	5	2	.....	.....	.....	.....	.....	.....	.....	.....	1
3	Malarial fever.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles.....	8	6	1	3	2	2	.....	8	.....	.....	.....
6	Scarlet fever.....	1	7	.....	.....	.....	1	.....	1	.....	.....	.....
7	Whooping cough.....	4	10	4	.....	.....	.....	.....	4	.....	.....	.....
8	Diphtheria and croup.....	21	12	2	3	3	3	3	14	4	2	.....
9	Influenza.....	6	3	.....	1	.....	.....	.....	1	.....	.....	.....
12	Other epidemic diseases.....	5	9	3	.....	1	.....	.....	4	1	.....	.....
13	Tuberculosis of the lungs.....	103	104	.....	1	.....	1	.....	2	2	.....	2
14	Tuberculous meningitis.....	11	11	3	2	1	.....	2	8	2	.....	1
15	Other forms of tuberculosis.....	7	6	.....	.....	.....	2	.....	2	.....	1	.....
16	Cancer, malignant tumor.....	63	67	.....	.....	.....	.....	.....	.....	.....	1	.....
17	Simple meningitis (except cerebro-spinal meningitis).	5	6	1	1	.....	.....	.....	2	.....	.....	.....
17a	Cerebro-spinal meningitis.....	2	2	.....	.....	.....	.....	.....	.....	1	.....	1
18	Apoplexy and softening of the brain.	48	57	.....	.....	.....	1	.....	1	.....	.....	.....
19	Organic heart diseases.....	162	144	.....	.....	.....	.....	.....	.....	1	4	2
20	Acute bronchitis.....	10	13	6	.....	.....	.....	.....	6	.....	.....	.....
21	Chronic bronchitis.....	6	8	.....	.....	1	.....	.....	1	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	112	103	14	8	4	1	.....	27	.....	1	1
22a	Broncho-pneumonia.....	52	41	19	10	1	1	.....	31	.....	.....	.....
23	Other respiratory diseases.....	10	11	2	2	.....	.....	.....	4	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	13	9	5	.....	.....	.....	.....	5	.....	.....	1
25	Diarrhea and enteritis (under two years).	15	23	12	3	.....	.....	.....	15	.....	.....	.....
26	Appendicitis and typhlitis.....	8	9	.....	.....	.....	.....	1	1	.....	.....	2
27	Hernia, intestinal obstruction.....	6	18	1	.....	.....	.....	.....	1	.....	.....	.....
28	Cirrhosis of liver.....	8	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis.....	67	75	.....	.....	.....	1	.....	1	.....	1	1
30	Diseases of women (not cancer)...	5	9	.....	.....	.....	.....	.....	.....	.....	.....	1
31	Puerperal septicemia.....	2	6	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases.....	4	5	.....	.....	.....	.....	.....	.....	.....	.....	1
33	Congenital debility and malformations.	57	47	55	2	.....	.....	.....	57	.....	.....	.....
34	Old age.....	4	5	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths.....	75	48	3	1	2	2	1	9	2	.....	1
36	Suicide.....	11	11	.....	.....	.....	.....	.....	.....	.....	.....	.....
37	Other diseases.....	166	173	29	2	1	1	1	34	8	1	3
38	Ill-defined causes.....	3	4	.....	.....	.....	.....	.....	.....	.....	.....	.....

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex. Males.	Sex. Females.	Abridged List Class Number.
25	33	61	62	60	64	81	73	71	69	80	58	37	11	11	577	508	
29	41	48	62	67	61	61	79	83	75	63	40	49	15	9	557	511	
....	1	2	1	....	....	....	....	....	....	....	....	....	....	....	2	3	1
....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	3
....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	4
....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	6	2	5
....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	1	....	6
....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	2	2	7
....	1	....	....	....	....	....	....	....	....	....	....	....	....	....	9	12	8
....	....	....	....	....	....	....	....	....	....	4	1	....	....	....	2	4	9
....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	2	3	12
9	11	19	14	12	14	8	2	4	2	1	1	....	....	....	60	43	13
....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	4	7	14
1	....	....	....	....	....	1	....	1	....	....	....	....	....	1	3	4	15
....	....	1	1	4	6	5	11	9	7	10	5	3	....	....	23	40	16
1	....	....	....	....	1	....	....	1	....	....	....	....	....	....	5	....	17
....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	2	17a
....	....	....	....	1	....	4	3	8	10	6	4	5	3	3	19	29	18
1	3	4	6	9	8	12	15	15	20	22	20	15	4	1	79	83	19
....	....	....	....	....	1	....	....	....	1	....	....	1	1	....	3	7	20
....	....	1	....	....	....	....	....	....	1	1	1	1	....	....	4	2	21
1	5	5	7	10	6	12	5	10	10	5	4	2	1	....	72	40	22
....	....	....	2	3	1	3	1	1	1	1	4	3	....	1	26	26	22a
....	1	1	1	....	1	....	1	....	....	....	....	1	....	....	6	4	23
....	1	....	....	....	....	3	2	....	....	....	....	1	....	....	5	8	24
....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	8	7	25
....	1	1	....	1	1	1	....	....	....	....	....	....	....	....	6	2	26
....	....	....	1	....	....	....	2	1	....	....	1	....	....	....	4	2	27
....	....	1	1	....	....	....	2	1	....	2	1	....	....	....	4	4	28
2	....	4	3	6	4	10	11	5	1	11	4	3	....	....	39	28	29
2	1	....	....	....	....	....	....	....	....	1	....	....	....	....	....	5	30
....	1	1	....	....	....	....	....	....	....	....	....	....	....	....	....	2	31
....	....	1	2	....	....	....	....	....	....	....	....	....	....	....	....	4	32
....	....	....	....	....	....	....	....	....	....	....	....	....	....	....	27	30	33
....	....	....	....	....	....	....	....	....	....	1	1	....	....	2	....	4	34
3	3	5	9	5	8	6	8	7	3	4	2	....	....	....	53	22	35
1	....	2	1	1	3	1	....	....	1	....	1	....	....	....	8	3	36
4	4	13	13	8	10	14	9	8	12	10	8	2	2	3	93	73	37
....	....	....	....	....	....	1	1	....	....	1	....	....	....	....	2	1	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence.										
			1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	1,085	43	42	24	29	21	55	24	42	42	33	35
	Rates per 1,000 population—1912	17.75	16.03	16.43	18.15	25.02	19.19	16.90	19.33	14.92	17.45	14.96	13.8
	1911	18.25	13.03	17.55	19.80	20.08	13.75	19.33	23.15	15.07	23.14	14.21	14.3
1	Typhoid fever	5	.....	1	.....	.....	.....	.....	.....	.....	.....	1	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	8	.....	4	.....	.....	1	2	.....	.....	.....	.....	.....
6	Scarlet fever	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough	4	.....	.....	.....	1	1	.....	1	.....	.....	.....	.....
8	Diphtheria and croup	21	4	1	1	.....	.....	1	.....	1	.....	.....	.....
9	Influenza	6	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....
12	Other epidemic diseases	5	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
13	Tuberculosis of the lungs	103	6	9	3	2	6	2	5	4	7	.....	1
14	Tuberculous meningitis	11	.....	.....	.....	.....	.....	2	.....	1	.....	.....	.....
15	Other forms of tuberculosis	7	.....	1	.....	.....	.....	1	.....	.....	.....	.....	.....
16	Cancer, malignant tumor	63	3	.....	.....	1	1	2	2	.....	.....	4	6
17	Simple meningitis (except cerebro-spinal meningitis).	5	.....	1	.....	.....	.....	.....	.....	.....	.....	1	.....
17a	Cerebro-spinal meningitis	2	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....
18	Apoplexy and softening of the brain.	48	1	1	3	2	.....	2	1	1	1	2	.....
19	Organic heart diseases	162	7	4	3	3	2	3	6	3	6	5	8
20	Acute bronchitis	10	.....	1	.....	.....	.....	1	.....	.....	2	.....	.....
21	Chronic bronchitis	6	1	.....	.....	.....	.....	.....	.....	1	1	.....	1
22	Pneumonia (except broncho-pneumonia).	112	4	6	1	2	3	12	2	8	1	7	4
22a	Broncho-pneumonia	52	.....	4	2	2	2	10	1	.....	2	2	1
23	Other respiratory diseases	10	.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....
24	Diseases of the stomach (cancer excepted).	13	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....
25	Diarrhea and enteritis (under two years).	15	.....	1	1	.....	.....	.....	.....	1	.....	.....	.....
26	Appendicitis and typhlitis	8	.....	.....	.....	.....	.....	2	.....	.....	.....	.....	.....
27	Hernia, intestinal obstruction,	6	.....	.....	.....	1	.....	.....	1	.....	.....	.....	.....
28	Cirrhosis of liver	8	3	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	67	3	3	2	1	1	.....	.....	2	.....	1	5
30	Diseases of women (not cancer),	5	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	2	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
32	Other puerperal diseases	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	57	3	.....	2	2	2	2	1	3	4	1	.....
34	Old age	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	75	1	.....	.....	.....	.....	7	2	8	5	1	3
36	Suicide	11	.....	.....	.....	.....	1	.....	.....	2	1	1	.....
37	Other diseases	166	5	3	6	11	1	5	2	5	11	6	5
38	Ill defined causes	3	1	1	.....	.....	.....	.....	.....	.....	.....	.....	1
	Total deaths under one year	160	8	3	4	6	4	17	3	5	8	1	.....

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number.
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
29	40	33	25	38	39	34	39	77	39	30	33	50	24	17	2	136	10	
3.43	21.89	16.04	13.61	16.40	16.78	17.40	13.99	14.64	14.22	11.41	11.93	14.55	9.84	12.55	....	....	....	....
5.59	23.51	16.72	17.58	15.09	20.98	17.49	10.56	17.93	16.46	11.96	10.77	10.80	12.31	....	....	....	....	....
....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	1
....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	3
....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	4
....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	5
....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	....	.....	...	6
....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	7
....	1	.....	.....	1	6	2	1	.....	1	.....	.....	.....	.....	.....	....	1	...	8
1	.....	1	.....	1	.....	.....	1	.....	.....	.....	.....	.....	.....	1	....	.....	...	9
2	.....	1	.....	1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	....	.....	...	12
2	4	6	1	2	4	2	4	4	4	5	3	5	4	1	1	6	...	13
....	1	.....	.....	.....	.....	.....	1	.....	.....	1	.....	2	.....	.....	....	3	...	14
....	.....	.....	.....	1	.....	.....	.....	1	1	.....	.....	.....	.....	.....	....	2	...	15
1	1	3	2	3	2	1	2	4	3	1	3	4	2	.....	....	12	...	16
....	.....	1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	....	1	...	17
....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	....	.....	...	17a
1	.....	3	1	2	1	.....	2	10	5	3	1	1	1	.....	....	3	...	18
4	10	4	7	5	6	5	13	11	12	4	4	7	1	2	....	16	1	19
....	.....	.....	.....	.....	.....	1	1	2	.....	.....	1	1	.....	.....	....	.....	...	20
....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	1	.....	.....	.....	....	.....	...	21
3	4	1	3	4	2	6	3	6	3	3	1	5	4	4	....	9	1	22
....	2	4	1	1	1	2	.....	3	.....	1	2	3	2	1	....	2	1	22a
....	.....	.....	.....	1	1	.....	.....	1	2	.....	.....	2	1	.....	....	.....	...	23
....	3	.....	.....	.....	2	.....	.....	2	1	.....	.....	1	.....	.....	....	3	...	24
....	.....	.....	.....	.....	1	2	.....	5	.....	.....	1	1	.....	.....	....	1	1	25
....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	....	5	...	26
....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	1	.....	.....	....	2	...	27
1	.....	.....	.....	.....	.....	.....	.....	2	.....	.....	1	.....	.....	.....	....	.....	...	28
4	3	4	1	4	1	3	2	6	.....	2	3	.....	1	1	1	12	1	29
1	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	2	...	30
....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	31
....	.....	.....	.....	.....	1	.....	1	.....	.....	1	1	.....	.....	.....	....	.....	...	32
4	2	1	2	3	2	1	2	3	1	1	3	1	1	4	....	6	...	33
....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	1	.....	1	1	....	.....	...	34
1	4	1	.....	.....	2	3	3	3	1	1	2	6	1	.....	....	19	1	35
1	1	1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	....	1	...	36
3	2	2	6	7	6	5	3	11	4	7	4	9	5	.....	....	28	4	37
....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	38
6	5	5	5	8	6	4	3	17	2	3	6	6	4	5	....	15	1	

January Infant Mortality.

Detailed List Class Number.	Causes of Death.	January Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	160	162	25	12	4	13	6	3	3	20	13	32	17	12	37	63	15
	Male	90	88	18	6	3	4	4	2	3	10	9	13	11	7	23	32	8
	Female	70	74	7	6	1	9	2	1	...	10	4	19	6	5	14	31	7
	White	160	157	25	12	4	13	6	3	3	20	13	32	17	12	37	63	15
	Colored	...	5	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
1	Typhoid fever	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
5	Smallpox	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
6	Measles	1	1	...	...	...	...	...	...	...	...	...	...	1	...	1	...	...
7	Scarlet fever	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
8	Whooping cough	4	4	...	...	...	...	...	...	...	2	...	2	...	...	1	3	...
9	Diphtheria and croup	2	...	...	...	...	...	...	...	...	...	...	2	...	...	1	1	1
10	Influenza	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
14	Dysentery	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
18	Erysipelas	3	1	...	...	...	...	...	...	...	1	...	1	1	...	2	1	...
19	Other epidemic diseases	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
20	Pus-infection and septicemia,	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
24	Tetanus	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
28	Tuberculosis of the lungs	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
29	Acute miliary tuberculosis	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
30	Tuberculous meningitis	3	6	...	...	...	...	...	...	...	...	...	2	...	1	1	2	...
31 35	Other forms of tuberculosis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
36	Rickets	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
37	Syphilis	3	2	...	...	...	...	1	...	...	1	...	...	...	1	...	2	1
38	Gonococcus infection	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
61	Simple meningitis	1	3	...	...	...	...	...	...	...	...	...	...	1	...	1	...	...
61*a*	Cerebro-spinal fever	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
63*a*	Acute poliomyelitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
71	Convulsions	1	2	...	...	...	...	...	...	...	...	...	...	...	1	...	1	...
76	Diseases of the ears	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
79	Organic diseases of the heart,	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
89	Acute bronchitis	6	5	...	...	...	...	...	...	...	1	2	2	...	1	2	4	...
91	Broncho-pneumonia	19	16	...	...	...	...	1	...	...	3	2	7	5	1	8	10	1
92	Pneumonia	14	8	...	1	...	...	1	...	...	...	...	5	4	3	4	8	2

January Infant Mortality.—*Concluded.*

Detailed List Class Number.	Causes of Death.	January Totals, Under 1 Year.		Under 1 day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
93	Pleurisy	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
103	Other diseases of stomach	5	2	...	...	1	...	...	...	...	1	...	2	...	1	1	3	...
104	Diarrhea and enteritis	12	20	...	...	...	...	...	1	...	4	3	2	1	1	3	9	1
108	Appendicitis and typhlitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
109	Hernias, intestinal obstruction,	1	8	...	...	...	...	...	...	...	...	...	1	...	...	...	1	1
117	Simple peritonitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
119	Acute nephritis	...	2	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
143	Furuncle	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
144	Acute abscess	1	...	...	...	...	...	...	...	...	1	...	...	...	...	...	1	...
145	Other diseases of skin, etc.	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
150*a*	Hydrocephalus	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
b	Congenital malformations of heart	10	14	2	...	1	2	1	1	...	1	1	1	...	...	1	3	1
c	Other malformations	3	...	...	2	...	...	1	...	...	...	...	...	...	...	...	...	...
151*a*	Premature birth	30	30	11	5	1	4	1	1	2	2	1	1	1	...	3	5	4
b	Congenital debility	12	...	1	...	...	3	...	...	1	3	2	2	...	...	3	5	...
152*a*	Injuries at birth	12	22	6	4	...	2	...	...	...	...	...	...	...	...	...	...	1
b	Other causes peculiar to early infancy	5	...	4	...	1	...	...	...	...	...	...	...	...	...	...	...	...
167	Burns (conflagrations excepted)	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
168	Absorption of deleterious gases,	1	...	...	...	...	...	...	...	...	...	...	1	...	...	1	...	...
172	Traumatism by fall	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
182, 184	Homicide	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
187, 189	Ill-defined diseases	...	3	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Other causes	11	9	1	...	...	2	...	...	...	...	2	1	3	2	4	4	2
	Breast fed *	37	34	...	...	...	...	...	1	1	8	4	12	6	5	37	...	...
	Bottle fed *	63	64	...	...	...	...	...	2	2	12	9	20	11	7	...	63	...
	Nonresidents	15	19	3	1	...	1	...	...	...	1	...	7	...	2	...	...	15

* Aged two weeks and over.

MORBIDITY STATISTICS.

January, 1912. **Cases Reported.**

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum
1	....	....	....	....	....	12	....	....	....	....	77	2	5
2	....	....	....	....	....	6	....	....	1	....	153	1	5
3	....	....	....	....	....	7	....	....	....	....	41	....	....
4	....	....	....	....	....	....	....	....	....	....	8	....	....
5	....	....	....	....	....	....	....	....	....	....	14	....	1
6	....	....	....	....	....	2	....	....	....	....	23	3	15
7	....	....	....	....	....	3	....	....	....	....	7	....	6
8	....	....	....	....	....	18	....	....	....	....	9	....	11
9	....	....	....	....	1	3	....	....	....	....	10	....	10
10	....	....	....	....	....	4	....	....	....	....	7	....	3
11	....	....	....	....	....	1	....	....	....	....	16	....	19
12	....	....	....	....	....	8	....	....	....	....	6	1	2
13	....	....	....	....	....	3	....	....	....	....	3	....	4
14	....	....	....	....	....	4	....	....	....	....	6	....	1
15	....	....	....	....	....	5	....	....	....	....	1	....	1
16	....	....	....	....	....	10	....	....	....	....	....	....	1
17	....	....	....	....	....	19	....	....	....	....	2	1	1
18	....	....	....	....	....	....	....	....	....	....	....	....	1
19	....	....	....	....	....	17	....	....	....	....	3	3	4
20	....	....	....	....	1	17	....	....	....	....	10	1	2
21	....	....	....	....	....	17	....	....	....	....	6	2	5
22	....	....	....	....	....	9	....	....	....	....	28	2	1
23	....	....	....	....	....	3	....	....	....	....	9	....	1
24	....	....	....	....	1	3	....	....	....	....	32	....	3
25	....	....	....	....	....	2	....	....	....	....	41	....	....
26	....	....	....	....	....	2	....	....	....	....	7	....	....
Total	....	....	....	....	3	175	....	....	1	....	519	16	203
Unknown	....	....	....	....	....	....	....	....	....	....	....	1	....
Nonresidents	....	....	....	....	....	9	....	....	....	....	....	....	6
Grand total	....	....	....	....	3	184	....	....	1	....	519	17	209
Corresponding month last year.	2	....	....	....	4	233	....	1	....	....	294	43	34

MORBIDITY STATISTICS.

Cases Reported. January, 1912.

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
11	....	....	....	....	7	....	....	....	24	....	....	1
8	1	....	....	....	14	2	6	....	9	15	....	2
10	....	....	....	....	3	....	....	....	3	5	....	3
1	....	....	....	....	6	....	....	....	6	11	....	4
....	....	....	....	....	5	....	2	....	3	5	....	5
1	....	....	1	....	14	2	....	....	6	12	....	6
1	....	....	....	....	11	....	....	....	1	3	....	7
1	....	....	1	...	11	1	1	....	7	23	....	8
2	....	1	....	....	21	....	1	....	12	....	....	9
1	....	....	....	....	2	....	1	....	6	....	....	10
5	....	....	1	....	1	....	2	....	23	1	....	11
6	....	....	....	....	8	....	....	....	4	8	....	12
2	....	....	....	....	12	3	....	....	4	3	....	13
4	....	....	....	....	4	....	3	....	3	....	....	14
1	....	....	....	....	4	....	1	....	10	....	....	15
6	....	....	....	....	5	1	....	....	4	....	....	16
7	....	....	....	....	10	....	1	....	11	....	....	17
1	....	....	....	....	6	....	....	....	4	....	....	18
3	....	....	....	....	7	1	....	....	7	7	....	19
5	....	....	....	....	10	1	....	....	27	13	....	20
5	....	....	....	....	12	....	....	....	12	7	....	21
3	....	....	....	....	6	1	2	....	5	1	....	22
7	....	....	....	....	4	....	2	....	7	2	....	23
4	....	....	....	....	7	....	1	....	13	1	....	24
8	....	....	....	....	3	....	1	....	10	1	....	25
1	....	....	....	....	14	1	....	....	5	5	....	26
4	1	1	3	....	207	13	24	....	226	123	....	Total
....	....	....	....	....	3	....	....	....	....	....	....	Unknown
4	2	....	3	....	10	1	....	....	....	....	....	Nonresidents
8	3	1	6	....	220	14	24	....	226	123	....	Grand total
9	....	1	2	....	313	....	19	....	107	208	....	Corresponding month last year.

DIVISION OF CHILD HYGIENE.

1. Medical Inspection of Schools.

Number of inspections made	21,254
Number of physical examinations made	14,445

There were 2,929 children excluded from school during the month ill with contagious disease as follows:

Diphtheria	4	Pediculosis	2,102
Scarlet fever	4	Trachoma	2
Measles	28	Acute or Purulent conjunctivitis	27
Chicken pox	58	Ringworm	36
Whooping cough	12	Scabies	51
Mumps	9	Impetigo	127
Pulmonary tuberculosis	3	Favus	6
Acute tonsilitis	119	Miscellaneous	314
Influenza	27		

There were 20,925 cases of noncontagious disease found, subdivided as follows:

Diseases of oral and respiratory tract	4,952
Diseases of eye	692
Diseases of ear	203
Diseases of skin	1,421
Dental caries,	5,908
Miscellaneous	7,749
	20,925

2. Physical Examination of Licensed Minors.

There were 321 children between the ages of 14 and 16 examined during this month. Two hundred and forty-nine were found without defects and 72 with defects as follows:

Throat	46	Heart	2
Hearing	2	Nose	3
Sight	13	Skin	8

3. Pre=Natal and Post=Natal Work.

During this month the two nurses engaged in this work have made 43 visits to pre-natal cases and 28 to post-natal cases, giving instructions in each case. In addition to these, in order to collect data needed for compiling statistics on the breast and bottle fed babies, these nurses visited over 100 mothers in various sections of the city.

As a result of the pre-natal and post-natal work, 2 cases of cervical glands were discovered and treatment advised. Four cases of deformities of both legs were found, of which 3 cases are now under treatment in the Children's Hospital. There were 2 cases of improper feeding seen and the mothers advised how to properly feed their babies. There were 6 cases of threatened eclampsia seen and 1 case of positive eclampsia.

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:		
Positive for diagnosis	118	
Positive for release	76	
Negative for diagnosis	1,205	
Negative for release	259	
"No growth" cultures	9	1,667
TUBERCULOSIS:		
Positive	80	
Negative	388	
Unsatisfactory	0	468
TYPHOID:		
Positive	12	
Negative	104	
Atypical	5	121

GLANDERS:	Strauss.	C.	F.	Ag.	
Positive	4	14	16	34	
Negative	3	8	7	18	
Unsatisfactory	2	0	0	2	
Atypical	0	1	0	1	55

GONORRHEA:		
Positive	17	
Negative	99	
Unsatisfactory	0	116
OTHER EXAMINATIONS:		
*Positive	13	
Negative	82	
Unsatisfactory	0	95
BACTERIOLOGICAL MILK EXAMINATIONS	532	532
Total		3,054

SPECIAL WORK:
Longevity of tubercle bacilli in sputa.

* K-L Vir. T. B. smear, organisms, typhoid conradi, malaria, ophthalmia, G-U. T. B., influenza, paratyphoid, typhoid feces and urine.

INSPECTION OF MILK, VINEGAR, ETC.

Examination as to Statute Requirements.

Samples examined, milk from stores	658
" " milk from wagons	496
" " milk brought in by citizens	61
" " milk for bacteriological examination	532
" " vinegar	40
" " butter and cheese	171
Total samples	1,958

INSPECTION OF DAIRIES.

Satisfactory * on first inspection	92	
Satisfactory on later inspection	477	
		569
Unsatisfactory on first inspection	47	
Unsatisfactory on later inspection	40	
		87
Total number of inspections		656
Dairies having milk rooms	363	
Dairies without milk rooms	293	
Number of cattle inspected	6,862	
Number of dairies prohibited shipping milk to Boston, because of insanitary conditions of premises	40	

* "Satisfactory" means having a score of at least 45 per cent by the government score card.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	599	Cattle condemned, 8 and parts	3,391 lbs.
Calves inspected	1,129	Calves condemned, 46	1,674 lbs.
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	4,845	Swine condemned, 7 and parts	2,792 lbs.

INSPECTION OF PROVISIONS.—ARTICLES CONDEMNED.

Meats.

Veal (immature)	34 lbs.
Mutton (tainted)	15 lbs.
Beef (tainted)	50 lbs.
Pork (tainted)	85 lbs.
Poultry (tainted)	50 lbs.

Miscellaneous.

Lobster (dead)	50 lbs.
Fish (tainted)	200 lbs.
Apples (decayed)	1 bush.

SANITARY DIVISION.

New reports	1,594
Reinspections	5,816
New tenement house reports	295
Nuisances reported	2,645
Legal notices	325
Court cases	11
Fines	$65
Tenements vacated	6
Houses demolished	3
Stable permits granted	3
Stable hearings	3
Dump permits	28

QUARANTINE.

Vessels inspected at quarantine	58
Total immigrants arriving in Boston	1,275

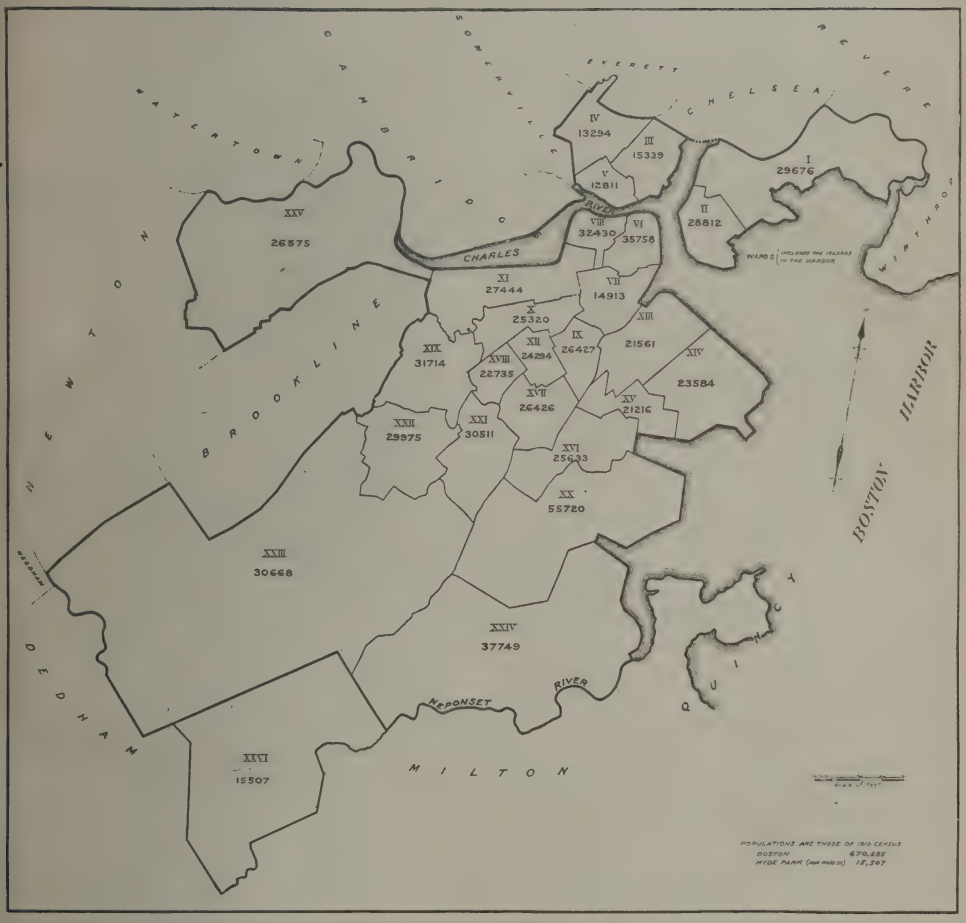
MONTHLY METEOROLOGICAL SUMMARY.

Taken at Weather Bureau, Boston, January, 1912.

Day.	Temperature, Degrees Fahrenheit.			Relative Humidity.	Daily Precipitation.	Actual Hours Sunshine.	Wind.		
	Maximum.	Minimum.	Mean.				Average Hourly Velocity. (Miles.)	Maximum Velocity. (Miles.)	Prevailing Direction.
M. 1.....	38	24	31	70	—	9.2	11.5	18	W.
T. 2.....	40	25	32	70	—	3.9	7.2	12	S. W. W.
W. 3.....	40	27	34	74	—	6.9	7.8	19	N.
T. 4.....	27	21	24	76	T.	—	10.3	19	N.
F. 5.....	25	12	18	77	.10	—	15.0	34	W.
S. 6.....	13	3	8	40	—	9.2	23.5	37	N. W.
S. 7.....	12	–1	6	60	T.	4.3	8.1	15	W.
M. 8.....	35	8	22	79	.27	1.8	10.9	25	S. E.
T. 9.....	46	13	29	68	.57	5.1	22.5	43	W.
W. 10.....	18	10	14	39	—	9.4	18.7	29	W.
T. 11.....	19	9	14	56	—	8.7	12.4	20	W.
F. 12	12	3	8	72	.18	—	13.0	21	N. W.
S. 13.....	11	–5	3	61	—	9.4	16.1	25	N. W.
S. 14.....	25	–1	12	88	T.	6.2	5.9	13	N. W.
M. 15.....	35	22	28	91	1.03	—	11.7	20	N.
T. 16.....	27	13	20	72	T.	3.4	15.5	22	W.
W. 17.....	28	10	19	76	.06	7.2	11.3	26	W.
T. 18.....	44	27	36	73	.03	—	10.2	17	S. W.
F. 19.....	53	26	40	72	.15	—	15.6	26	S. W.
S. 20.....	26	17	22	61	—	9.6	9.4	16	N. W.
S. 21.....	34	21	28	62	—	9.2	7.7	14	W.
M. 22.....	36	24	30	54	.01	5.3	9.8	17	S. W. W.
T. 23.....	46	31	38	79	T.	—	8.0	28	S. W.
W. 24.....	34	14	24	55	T.	4.3	11.6	27	N. W.
T. 25.....	19	8	14	53	—	9.8	13.5	22	N. W.
F. 26.....	16	5	10	44	—	5.2	7.4	14	N. W.
S. 27.....	18	6	12	66	.02	—	12.0	29	N. W.
S. 28.....	20	5	12	48	—	9.9	12.5	26	W. N. W.
M. 29.....	30	16	23	78	.30	—	7.8	22	N.
T. 30.....	30	19	24	90	.07	—	12.3	26	N.
W. 31.....	32	25	28	86	.08	—	9.1	21	N. W.
Totals.....	—	—	—	—	2.87	138.0	—	—	—
Means.....	28.7	14.09	21.3	67.4	0.09	—	11.8	—	W.

Latitude 42 degrees 21 minutes. Longitude 71 degrees 4 minutes.

BOSTON WARD MAP.



Vol. 1 FEBRUARY, 1912 No. 2

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF T E

CITY OF BOSTON

PAGE
Child Hygiene 29
Vital Statistics 37
Monthly reports 50

CITY OF BOSTON
PRINTING DEPARTMENT
1912

ORGANIZATION OF THE HEALTH DEPARTMENT.

SAMUEL H. DURGIN, M. D., *Chairman.*
FRANCIS X. MAHONEY, M. D.
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

ALLIED PRINTING TRADES UNION LABEL COUNCIL NEW YORK, N.Y.

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, FEBRUARY, 1912. No. 2.

CHILD HYGIENE.

BY WILLIAM J. GALLIVAN, M. D.

Chief of the Division of Child Hygiene, Boston Board of Health.

The Division of Child Hygiene was created in March, 1910. It is concerned with the physical welfare of every child in Boston from the time of conception up to the age of sixteen years. The work of this division is classified into three subdivisions as follows:

1. Pre-Natal and Post-Natal Work.
2. Medical Inspection of Schools.
3. Physical Examination of Licensed Minors.

1. PRE-NATAL AND POST-NATAL WORK.

Under this heading prospective mothers who are unable to obtain a physician's advice are regularly visited by the nurses connected with the Division of Child Hygiene. They are counseled and advised by the nurses in matters of personal hygiene so that they may be in the best physical condition to undergo a successful labor. Particular attention is given to the care of the breasts, so that mothers will be able to nurse their babies. And, finally, they are assisted in obtaining proper medical attendance from the reputable hospitals in this city which care for obstetric cases. The nurses' visits are continued after the birth of the baby. Every mother is strongly advised to nurse her baby. When breast feeding is impossible, the mother is instructed in the home modification of milk. Particularly is the nurse vigilant about the condition of the eyes of the new-born infant. Upon the slightest appearance of illness, the mother and baby are referred to reputable hospitals and dispensaries, and in many cases are accompanied by the nurse. A record of every baby born in Boston under

one year of age is being prepared by the Division of Child Hygiene. Of this number the breast-fed babies cause little or no anxiety. The bottle-fed babies are visited at regular intervals by the nurse. Those babies who are under a physician's care are visited only to make sure that such medical care is continuous, particularly in the summer months. The bottle babies of the poor are cared for by reputable medical charity.

There are two nurses assigned to this work. Their report for five months ending January 31 is as follows:

SEPTEMBER.

Pre-Natal.

Cases	133	Premature births	2
Visits	191	Deaths, babies	4
Babies born	47 ~~74~~		

The following defective conditions were noted:

Miscarriages	2	Threatened eclampsia	3
Œdema	7	Varicose veins	15

Mothers attended as follows:

Hospital attendance	25	Midwife	17
Family physician	5		

Post-Natal.

Cases	15	Bottle-fed babies	6
Visits	17	Both feedings	7
Breast-fed babies	34		

Defective conditions noted as follows:

Cardiac disease	1	Orthopedic defects	3
Cervical glands	1	Otitis media	4
Improper feeding	9	Skin disease	7
Ophthalmia	3		

OCTOBER.

Pre–Natal.

Cases	89	Deaths, babies	2
Visits	208	Deaths, mothers	1
Babies born	53		

The following defective conditions were noted:

Eclampsia, positive	1	Œdema	3
Mastitis	1	Placenta previa	1
Miscarriages	2	Varicose veins	8

Mothers attended as follows:

Hospital attendance	27	Midwife	21
Family physician	5		

Post-Natal.

Cases	10	Bottle-fed babies	8
Visits	115	Both feedings	2
Breast-fed babies	43		

Defective conditions noted as follows:

Ophthalmia	1	Skin disease	1

NOVEMBER.

Pre-Natal.

Cases	155	Babies born	47
Visits	210	Deaths, babies	4

The following defective conditions were noted:

Eclampsia, threatened	1	Œdema	6
Nephritis	1	Varicose veins	13

Mothers attended as follows:

Hospital attendance	6	Midwife	38
Family physician	3		

Post-Natal.

Cases	51	Bottle-fed babies	9
Visits	163	Both feedings	1
Breast-fed babies	37		

Defective conditions noted as follows:

Cervical abscess	1	Orthopedic defects	4
Improper feeding	10	Skin disease	3
Ophthalmia	1	Umbilical hernia	2

DECEMBER.

Pre-Natal.

Cases	163	Babies born	38
Visits	228	Deaths, babies	1

The following defective conditions were noted:

Eclampsia, threatened	2	Œdema	2
Miscarriages	3	Varicose veins	10

Mothers attended as follows:

Hospital attendance	7	Midwife	23
Family physician	8		

Post-Natal.

Cases	31	Bottle-fed babies	5
Visits	176	Both feedings	1
Breast-fed babies	32		

Defective conditions noted as follows:

Cervical abscess	1	Orthopedic defects	3
Improper feeding	6	Otitis media	2
Ophthalmia	5	Skin disease	4

JANUARY.

Pre-Natal.

Cases	74	Babies born	63
Visits	132		

The following defective conditions were noted:

Eclampsia, threatened	2	Miscarriage, threatened	1
Mastitis	1	Œdema	2
Miscarriages	4	Varicose veins	4

Mothers attended as follows:

Hospital attendance	14	Midwife	40
Family physician	9		

Post-Natal.

Cases	22	Bottle-fed babies	6
Visits	136	Both feedings	4
Breast-fed babies	53		

Defective conditions noted as follows:

Cervical abscess	2	Orthopedic defects	2
Improper feeding	2	Skin disease	4
Ophthalmia	2	Umbilical hernia	2

2. MEDICAL INSPECTION OF SCHOOLS.

Medical inspection of schools begins at the kindergarten class and ends with the high schools. Of equal importance are the three objects which medical inspection has in view, as follows:

1. The detection of communicable diseases and the exclusion from school of every pupil so afflicted.

2. The protection of every pupil in the schools from contagion unrecognized by parent or teacher.

3. The detection of such defects which if untreated would result in permanent injury to the pupil.

Every case requiring medical or dental aid is referred to the family physician or to the family dentist. Those who are unable to employ professional services are referred to reputable hospitals or dental clinics and in many cases are accompanied to these clinics by the nurse.

Under the present system the school physicians are under the authority of the Board of Health; the school nurses are under the authority of the School Committee. The number of nurses employed is altogether inadequate for the work required. The Board of Health is ready to employ a corps of nurses to assist in school inspection, but up to the present time they have not been willing to duplicate a system main-

tained by the School Committee. A transfer, then, of the nurses from the School Committee to the Board of Health would render medical inspection of schools as nearly perfect as human endeavor can accomplish.

The school population at this date is 123,091. This includes attendance in public and parochial schools. For this work there are employed eighty-two physicians, who are required to visit every school building on every school morning of the year.

For the period covered by this report the result of the work of the school physicians is as follows:

CONTAGIOUS DISEASES.

Exclusions from School, September 13, 1911, to February 1, 1912.

	September 13 to October 1.	October.	November.	December.	January.	Total.
Diphtheria	2	4	9	14	4	33
Scarlet fever	3	3	.....	4	4	14
Measles	1	4	1	.....	28	34
German measles	.....	1	2	9	.....	12
Chicken-pox	6	60	58	30	58	212
Whooping cough	9	17	14	9	12	61
Mumps	6	8	5	8	9	36
Pulmonary tuberculosis	2	6	6	1	3	18
Acute tonsilitis	35	131	131	83	119	499
Influenza	1	8	5	.....	27	41
Gonorrhœa	.....	.....	.....	.....	.....	.....
Syphilis	3	2	3	.....	.....	8
Pediculosis	675	1,686	1,599	1,297	2,102	7,359
Trachoma	1	2	.....	1	2	6
Acute or purulent conjunctivitis	25	57	37	41	27	187
Ringworm	44	94	81	68	70	357
Scabies	32	86	64	38	51	271
Impetigo	100	238	141	87	127	693
Favus	52	9	2	6	6	75
Molluscum contagiosum	.....	1	1	.....	1	3
Erysipelas	.....	1	1	1	.....	3
Miscellaneous	129	235	213	59	314	950
Number of inspections made	14,502	33,941	26,017	13,639	21,254	109,353
Number physical examinations made	5,969	24,595	22,885	13,691	14,445	81,585
Visits to homes	34	58	71	92	190	445

NONCONTAGIOUS DISEASES.

September 13, 1911, to February 1, 1912.

	September 13 to October 1.	October.	November.	December.	January.	Total.
DISEASES OF THE ORAL AND RESPIRATORY TRACT.						
1. Mouth.						
Stomatitis:						
(*a*) Simple (erythematous)	1	2	3	1	2	9
(*b*) Aphthous (herpetic)	1	12	9	1	3	26
(*c*) Ulcerative	.....	.....	9	.....	2	11
(*d*) Parasitic (thrush, etc.)	.....	.....	.....	.....	1	1
Aveolar abscess	20	44	28	20	28	140
2. Pharynx.						
Acute pharyngitis	32	108	199	136	269	744
Hypertrophic pharyngitis (acute and chronic)	37	52	94	40	74	297
3. Tonsils.						
Hypertrophic tonsilitis	1,823	5,355	5,231	3,165	2,219	17,793
Abscess	18	59	71	24	17	189
4. Uvula.						
Elongation	30	93	154	95	85	459
5. Nose.						
Acute rhinitis	53	222	311	240	339	1,175
Chronic rhinitis	56	143	204	65	90	558
Purulent rhinitis	3	10	19	7	4	43
Ozæna	3	9	10	4	4	30
Deviations of septum	16	52	41	40	32	181
Epistaxis	3	27	14	15	33	92
6. Naso-Pharynx.						
Naso-pharyngitis (post nasal catarrh)	99	202	243	126	154	824
Adenoid disease	612	2,100	1,815	1,053	1,007	6,587
7. Larynx.						
Acute laryngitis	13	39	99	57	104	312
Chronic laryngitis	7	14	7	7	19	54
8. Bronchi.						
Acute bronchitis	38	186	338	184	312	1,058
Chronic bronchitis	18	73	102	53	82	328
DISEASES OF THE EAR.						
Foreign bodies (cerumen, etc.)	27	87	156	83	55	408
Otitis media, catarrhal (acute and chronic)	15	89	77	63	101	345
Otitis media, suppurative (acute and chronic)	13	57	59	29	44	202
Mastoiditis	.....	1	4	.....	3	8
DISEASES OF THE EYE.						
1. Foreign Bodies.	15	38	54	20	17	144
2. Eyelids.						
Blepharitis	163	407	339	260	137	1,306
Stye	56	119	119	72	140	506
Ptosis	4	3	2	2	4	15
Trichiasis	3	.....	.....	.....	.....	3
3. Lachrymal Organs.						
Obstruction of duct	1	2	1	1	1	6
Abscess	2	2	2	.....	.....	6
4. Conjunctiva.						
Conjunctivitis	139	229	239	136	248	986
Phlyctenular	12	18	27	5	9	71
Granular	3	5	4	4	15	31
5. Cornea.						
Interstitial keratitis	1	2	20	1	1	25
Ulcer	1	4	7	2	3	17
Opacity	8	19	15	6	4	52

	September 13 to October 1.	October.	November.	December.	January.	Total.
6. Iris.						
Iritis	2	6	.....	.....	5	13
Synechiæ	1	.....	.....	.....	.....	1
7. Muscles.						
Strabismus	104	183	126	76	109	598
Nystagmus	3	7	3	1	4	18
Paralysis of extra-ocular muscles	5	5	1	3	.....	14
Diseases of the Skin.						
Acne	45	159	291	203	205	903
Alopecia areata	29	25	22	10	16	102
Dermatitis	109	163	171	82	163	688
Eczema	185	449	479	249	528	1,890
Erythema multiforme	10	9	9	2	12	42
Erythema simplex	6	14	12	26	12	70
Furunculus	42	50	54	42	69	257
Herpes simplex	138	212	242	120	189	901
Herpes zoster	16	23	20	16	16	85
Pemphigus	.....	4	5	.....	1	10
Pityriasis, maculata et circinata	.....	1	1	.....	1	3
Pruritus	1	4	13	.....	2	20
Psoriasis	13	19	16	9	19	76
Purpura	.....	.....	4	.....	2	6
Seborrhœa	103	224	538	310	89	1,264
Tinea versicolor	7	12	13	6	6	44
Urticaria	17	32	33	20	23	125
Verruca	68	53	43	49	41	254
Miscellaneous Diseases.						
Abscess	44	126	90	67	116	443
Acute torticollis	.....	.....	.....	.....	.....	.....
Anæmia	393	1,183	927	431	472	3,406
Burns	32	78	58	49	141	358
Cardiac diseases	125	552	587	364	564	2,192
Cataract	.....	.....	.....	.....	.....	.....
Cervical adenitis	392	2,827	2,877	1,769	1,510	9,680
Chorea	7	108	39	23	51	228
Contusions	112	273	287	230	336	1,238
Debility	82	363	242	151	162	1,000
Defect in speech	.....	.....	.....	.....	.....	.....
Deformities (spinal)	27	114	109	208	107	565
Deformiites (extremities)	58	130	159	86	127	560
Dental caries	2,907	9,126	8,387	5,019	5,908	31,347
Earache	.....	.....	.....	.....	.....	.....
Epilepsy	55	29	77	10	31	202
Favus	.....	2	.....	.....	.....	2
Fractures	7	12	11	14	9	53
Gastric diseases	32	130	137	94	171	564
Habit spasm	1	.....	.....	.....	.....	1
Headache	53	149	133	107	203	645
Intestinal diseases	14	33	28	34	37	146
Nervousness	.....	.....	.....	.....	.....	.....
Neuralgia	5	21	23	28	41	118
Rheumatism	4	18	15	24	55	116
Sprains	52	119	125	40	112	448
T. B. hip disease	.....	2	.....	1	2	5
Ulcer	28	55	26	16	49	174
Urinary disease	7	16	.....	10	18	51
Wounds	286	581	566	387	700	2,520
Unclassified	902	2,196	2,744	1,374	1,962	9,178
Vaccinations (performed)	280	256	138	24	55	753
Wry neck	1	.....	.....	.....	.....	1
Certificate of vaccination	2,224	1,362	505	191	219	4,501
Pediculosis	400	.....	550	190	124	1,264
Syncope	1	.....	.....	.....	.....	1
Defective vision	.....	33	36	25	52	146
Defective mentally	.....	13	24	7	7	51
Pleurisy	.....	1	.....	.....	.....	1
Cleft palate	.....	1	1	.....	.....	2
Infantile paralysis	.....	1	1	.....	3	5
Rachitis	.....	166	167	36	7	476
Goitre	.....	1	.....	.....	.....	1
Bifurcate uvula	.....	.....	2	.....	2	4
Cervical Potts' disease	.....	.....	1	.....	.....	1
Jaundice	.....	.....	.....	.....	2	2
Hernia	.....	.....	.....	.....	1	1

3. Examination of Licensed Minors.

Statute law requires that every minor under the age of sixteen years must receive a certificate from the School Committee before being allowed to go to work. This certificate is granted by the School Committee after a physical examination by this division and an intelligence test on the part of the School Committee. For this work there is employed one physician and one matron. The results of this work for the period covered by this report are as follows:

	Number Examined.	Number Found Without any Defect.	Number Found Defective.
September, 1911	822	746	76
October, 1911	445	410	35
November, 1911	508	417	91
December, 1911	349	260	89
January, 1912	321	249	72
Totals	2,445	2,082	363

Defective conditions noted as follows:

Cardiac	18	Nose	5
Cervical glands	2	Skin	16
Ears	8	Throat	173
Eyes	140	Miscellaneous	4

Of the 2,445 children examined, thirty were refused certificates because they were judged physically unable to perform the work which they wished to do.

VITAL STATISTICS.

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF FEBRUARY, 1912.

Boston had 1,035 deaths in February, 1912, compared with 1,024 in February, 1911; corresponding to a death rate of 18.09 for February, 1912, against 19.38 for February, 1911.

Of deaths from reportable diseases the principal decreases for 1912 were whooping cough, 11; tuberculosis of the lungs, 3; diphtheria and croup, 2; and scarlet fever and typhoid fever, 1 each; while the principal increase was measles, 8.

Deaths from other forms of tuberculosis were 20 for each year.

Other important differences were as follows:

February, 1912, Decreases:	
Pneumonia	34
Violent deaths	19
Broncho-pneumonia	10
Bronchitis	3
February, 1912, Increases:	
Apoplexy	20
Organic heart disease	8
Cancer	7
Hernia	6
Puerperal septicemia	5
Suicide	5

There were 16 more deaths under 1 year than in February, 1911. Under 50 years there were 6 less, and over 50 years 17 more than in February, 1911. Ward 14 had the lowest rate, 10.91, and Ward 2 the highest rate, 28.44. Of the 12 deaths from measles in the entire city, 8 were in Ward 2. Other deaths from reportable diseases in the ward were: Tuberculosis, 4; scarlet fever, 2; typhoid, 1, and whooping cough, 1. Nine deaths from broncho-pneumonia also helped to raise the rate of Ward 2. Deaths of nonresidents were 109 against 104 in February, 1911. If these deaths of nonresidents are deducted, the rate for the month is only 16.19.

There were decreases in the number of cases reported of diphtheria, scarlet fever, typhoid fever, and whooping cough; while measles, varicella, and tuberculosis furnished more cases than a year ago. Measles, so prevalent in Ward 2 in January,

continued unabated during February, having 147 cases for the month, though Ward 25, at the other end of the city, led all other wards with 235 cases; fortunately, however, there were no deaths from measles in Ward 25.

There were 191 deaths under 1 year, which is 21 more than the average for the corresponding month for the preceding 5 years. Seventy-seven of these deaths were due to premature birth, congenital debility, malformations, and other diseases peculiar to early infancy; 56 to bronchitis and pneumonia; 17 to reportable diseases; 13 to diarrhœa and enteritis, and 28 to other causes. Ward 20 suffered most, with 27 deaths, and Ward 2 came next with 16. Of the 191 deaths 119 were over 2 weeks old, 85 over 3 months, and 52 over 6 months. Of the 119 over 2 weeks old, 90 were bottle fed.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
* Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	137.06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	‡298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston January 1, 1912, and became Ward 26. Under "Boston," in the above table, Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau.

‡ An infant asylum is located in this ward.

February. General Summary.

	1912.	1911.
Total deaths, February	1,035	1,024
Population, estimated*	720,031	688,912
Death rate per 1,000	18.09	19.38
Deaths of nonresidents	109	104
Corrected death rate†	16.19	17.41

*Population estimated by arithmetical method used by Census Bureau.
†Nonresidents not included.

February, 1912. Statement of Deaths.

Total number (stillbirths excluded)	1,035
Sex.	
Males	524
Females	511
Condition.	
Single	473
Married	356
Widowed	197
Divorced	4
Unknown	5
Color.	
White	1,006
Black (negro or mixed)	29
Deaths of children:	
Under one year	191
Under two years	231
Under five years	265
Stillbirths during the month,	59

Nativity.	
United States	656
Ireland	162
England and Wales	17
Scotland	9
Germany	13
Canada	74
Italy	35
Russia and Poland	23
Sweden and Norway	11
France	2
Other countries	17
Unknown	16
Nativity of Mothers.	
United States	288
Ireland	324
England and Wales	28
Scotland	17
Germany	25
Canada	87
Italy	97
Russia and Poland	44
Sweden and Norway	15
France	3
Other countries	22
Unknown	85

February, 1912. Mortality by

Abridged List Class Number.	Causes of Death.	Totals. February, 1912.	Totals. February, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes. 1912	1,035	.....	191	40	15	11	8	264	18	16	12
	Total, all causes. 1911	.....	1,024	175	44	15	13	12	259	15	10	18
1	Typhoid fever	2	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	12	4	4	5	2	1	.....	12	.....	.....	.....
6	Scarlet fever	11	12	1	2	3	1	1	8	1	1	.....
7	Whooping cough	6	17	2	1	.....	.....	1	4	2	.....	.....
8	Diphtheria and croup	9	11	1	1	3	2	.....	7	2	.....	.....
9	Influenza	4	11	.....	.....	.....	.....	.....	.....	.....	1	.....
12	Other epidemic diseases	10	4	3	1	.....	.....	.....	4	.....	.....	.....
13	Tuberculosis of the lungs	91	94	3	.....	1	.....	1	5	.....	3	2
14	Tuberculous meningitis	12	14	5	3	.....	1	1	10	2	.....	.....
15	Other forms of tuberculosis	8	6	.....	.....	.....	1	1	2	1	.....	.....
16	Cancer, malignant tumor	62	55	1	.....	.....	.....	.....	1	.....	.....	.....
17	Simple meningitis (except cerebro-spinal meningitis).	6	5	5	.....	1	.....	.....	6	.....	.....	.....
17a	Cerebro-spinal meningitis	4	3	.....	.....	2	.....	.....	2	1	1	.....
18	Apoplexy and softening of the brain	52	32	.....	.....	.....	.....	.....	.....	.....	.....	.....
19	Organic heart diseases	138	130	.....	.....	1	.....	1	2	1	4	.....
20	Acute bronchitis	14	13	6	2	1	.....	.....	9	.....	.....	.....
21	Chronic bronchitis	1	5	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	93	127	20	6	.....	.....	2	28	2	1	1
22a	Broncho-pneumonia	60	70	30	8	1	2	.....	41	1	.....	.....
23	Other respiratory diseases	8	7	1	.....	.....	.....	.....	1	1	.....	.....
24	Diseases of the stomach (cancer excepted).	13	6	1	1	.....	.....	.....	2	.....	.....	.....
25	Diarrhea and enteritis (under two years).	14	14	13	.....	.....	.....	.....	14	.....	.....	.....
26	Appendicitis and typhlitis	7	6	.....	.....	.....	.....	.....	.....	.....	.....	.....
27	Hernia, intestinal obstruction	9	3	.....	1	.....	.....	.....	1	.....	.....	.....
28	Cirrhosis of liver	4	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	78	75	.....	.....	.....	.....	.....	.....	.....	2	1
30	Diseases of women (not cancer)	8	9	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	7	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	3	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	55	58	53	.....	.....	.....	.....	53	.....	.....	.....
34	Old age	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	45	64	3	.....	.....	.....	.....	3	2	1	1
36	Suicide	9	4	.....	.....	.....	.....	.....	.....	.....	.....	1
37	Other diseases	173	145	38	8	.....	3	.....	48	2	2	6
38	Ill-defined causes	3	8	1	.....	.....	.....	.....	1	.....	.....	.....

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex.		Abridged List Class Number.
															Males.	Females.	
42	38	47	43	55	52	66	69	68	69	48	59	38	25	5	524	511	
38	47	45	48	56	58	75	45	68	71	65	45	31	18	12	525	499	
1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	7	5	5
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	8	6
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	5	7
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	5	8
.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....	1	.....	.....	.....	.....	4	9
.....	.....	.....	.....	1	2	2	.....	.....	1	.....	.....	.....	.....	.....	8	2	12
14	13	15	4	11	7	5	1	4	3	2	.....	1	1	.....	41	50	13
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	7	14
2	1	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	8	.....	15
.....	.....	1	3	2	6	7	15	9	2	9	5	1	1	.....	28	34	16
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	2	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	3	17a
.....	1	.....	1	1	2	1	4	3	8	11	10	4	4	2	27	25	18
2	4	3	4	9	5	16	11	19	17	8	20	9	4	.....	68	70	19
.....	.....	.....	.....	1	.....	.....	2	.....	.....	1	1	.....	.....	.....	5	9	20
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	1	.....	21
4	4	7	3	5	4	9	7	3	10	.....	1	4	.....	.....	55	38	22
.....	.....	1	1	.....	.....	.....	.....	2	.....	2	4	3	5	.....	26	34	22a
1	1	.....	.....	1	1	.....	.....	.....	.....	.....	1	.....	1	.....	5	3	23
.....	2	1	1	.....	3	.....	2	.....	1	1	.....	.....	.....	.....	4	9	24
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	7	7	25
.....	2	1	.....	2	.....	.....	.....	1	.....	1	.....	.....	.....	.....	3	4	26
1	.....	.....	.....	1	1	1	1	.....	.....	1	1	1	.....	.....	6	3	27
.....	.....	.....	.....	.....	1	.....	1	.....	2	.....	.....	.....	.....	.....	3	1	28
2	.....	2	5	7	6	8	8	13	10	5	5	3	1	.....	37	41	29
2	1	2	.....	.....	2	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	8	30
1	5	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	7	31
1	1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	32
1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	30	25	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	2	2	2	34
4	2	4	5	4	2	4	2	4	2	1	2	2	.....	.....	37	8	35
1	.....	2	.....	3	1	.....	.....	.....	.....	1	.....	.....	.....	.....	5	4	36
5	.....	6	13	7	8	13	12	9	12	5	8	9	6	1	92	81	37
.....	.....	.....	.....	.....	1	.....	.....	.....	1	.....	.....	.....	.....	.....	1	2	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence.										
			1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	1,035	28	68	20	25	22	52	22	38	34	36	32
	Rates per 1,000 population—1912	18.09	11.16	28.44	16.17	23.06	21.49	17.08	18.94	14.43	15.10	17.44	13.56
	Rates per 1,000 population—1911	19.38	13.16	23.85	15.17	13.53	16.23	17.19	30.93	15.49	22.30	18.27	11.82
1	Typhoid fever	2	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	12	.....	8	.....	1	.....	2	.....	.....	.....	.....	.....
6	Scarlet fever	11	2	2	.....	.....	.....	1	.....	.....	1	.....	.....
7	Whooping cough	6	.....	1	1	.....	.....	1	.....	1	.....	.....	.....
8	Diphtheria and croup	9	1	.....	.....	.....	.....	.....	1	.....	1	1	.....
9	Influenza	4	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	10	.....	1	.....	.....	1	.....	.....	.....	.....	.....	.....
13	Tuberculosis of the lungs	91	1	4	5	2	3	4	2	3	2	3	.....
14	Tuberculous meningitis	12	.....	.....	1	1	2	1	.....	.....	1	.....	.....
15	Other forms of tuberculosis	8	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
16	Cancer, malignant tumor	62	.....	2	1	1	.....	3	2	3	4	3	4
17	Simple meningitis (except cerebro-spinal meningitis).	6	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
17a	Cerebro-spinal meningitis	4	.....	1	.....	.....	1	.....	.....	.....	.....	.....	.....
18	Apoplexy and softening of the brain.	52	5	1	1	1	1	.....	1	.....	2	3	.....
19	Organic heart diseases	138	3	6	3	5	1	5	5	2	5	5	3
20	Acute bronchitis	14	.....	1	.....	1	.....	1	.....	1	1	.....	.....
21	Chronic bronchitis	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	93	.....	5	3	3	4	10	4	8	4	6	4
22a	Broncho-pneumonia	60	4	9	1	2	1	7	.....	5	1	.....	.....
23	Other respiratory diseases	8	.....	.....	.....	.....	.....	1	.....	1	.....	2	2
24	Diseases of the stomach (cancer excepted).	13	.....	2	.....	.....	1	.....	.....	.....	.....	.....	.....
25	Diarrhea and enteritis (under two years).	14	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	1
26	Appendicitis and typhlitis	7	.....	.....	1	1	.....	1	.....	.....	.....	.....	.....
27	Hernia, intestinal obstruction,	9	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
28	Cirrhosis of liver	4	.....	1	.....	.....	.....	.....	.....	.....	.....	1	1
29	Bright's disease and nephritis	78	4	6	1	3	1	1	2	1	3	3	4
30	Diseases of women (not cancer),	8	1	.....	.....	.....	.....	.....	.....	1	.....	.....	1
31	Puerperal septicemia	7	.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....
32	Other puerperal diseases	3	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	55	1	1	2	1	2	1	1	4	3	1	.....
34	Old age	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	45	.....	2	.....	.....	.....	3	1	2	2	2	.....
36	Suicide	9	.....	.....	.....	.....	.....	.....	.....	.....	1	1	.....
37	Other diseases	173	5	10	.....	3	4	8	3	5	3	4	11
38	Ill defined causes	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1
	Total deaths under one year	191	2	16	3	3	3	10	3	11	5	3	4

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number.
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
25	26	21	29	32	35	30	43	76	52	31	29	57	37	24	1	109	1	
12.37	15.21	10.91	16.88	14.76	16.10	16.41	16.49	15.45	20.27	12.60	11.21	17.73	16.23	18.94	....	....	....	....
20.93	34.50	19.06	16.42	15.72	22.26	22.78	15.33	14.11	19.46	12.39	9.05	17.28	9.87	.....	....	....	....	....
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	....	....	...	5
1	.....	1	.....	.....	.....	2	.....	.....	.....	.....	.....	.....	1	.....	....	....	...	6
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....	.....	....	....	...	7
.....	.....	.....	.....	1	1	1	1	.....	1	.....	.....	.....	.....	.....	....	....	...	8
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	....	....	...	9
1	.....	1	1	.....	.....	1	1	.....	.....	.....	.....	1	.....	1	....	1	...	12
1	2	5	3	3	1	2	11	7	5	2	2	3	2	1	....	12	...	13
1	.....	.....	1	.....	.....	.....	1	1	1	1	.....	.....	.....	.....	....	....	...	14
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	4	2	.....	....	1	...	15
.....	5	1	2	1	1	3	4	1	5	3	2	1	4	2	....	4	...	16
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	1	.....	2	.....	.....	....	....	...	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	2	...	17a
3	.....	3	1	1	2	2	3	3	2	.....	2	5	1	5	....	4	...	18
6	3	2	5	4	6	3	2	13	7	9	6	11	7	2	....	8	1	19
.....	3	.....	.....	.....	.....	.....	1	1	1	.....	1	1	.....	1	....	....	...	20
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	21
1	3	.....	.....	2	4	2	2	4	2	2	6	6	4	1	....	3	...	22
1	.....	.....	1	5	1	.....	1	8	2	1	.....	5	2	.....	1	2	...	22a
1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	....	...	23
.....	2	.....	.....	.....	1	.....	.....	.....	1	.....	.....	1	.....	.....	....	5	...	24
.....	.....	.....	1	.....	.....	.....	.....	8	.....	.....	.....	.....	1	2	....	....	...	25
.....	.....	.....	.....	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	1	....	1	...	26
1	.....	.....	1	1	.....	.....	.....	.....	1	1	.....	1	.....	.....	....	3	...	27
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	28
3	1	2	2	2	3	2	1	8	6	3	3	4	2	1	....	6	...	29
.....	.....	.....	.....	1	1	.....	.....	.....	1	.....	.....	.....	.....	.....	....	2	...	30
.....	1	.....	.....	.....	1	.....	.....	1	.....	.....	.....	.....	.....	.....	....	2	...	31
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	2	...	32
1	.....	1	.....	2	4	3	5	4	3	.....	1	5	2	2	....	5	...	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	2	.....	.....	1	1	.....	....	....	...	34
1	2	.....	2	2	1	1	4	2	2	.....	.....	.....	.....	.....	....	16	...	35
.....	.....	.....	.....	1	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	....	5	...	36
3	4	4	7	6	6	7	5	14	8	7	6	5	8	5	....	22	...	37
.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	38
2	4	4	7	9	7	3	9	27	5	1	1	14	10	8	1	16	...	

VITAL STATISTICS.

February Infant Mortality.

Detailed List Class Number.	Causes of Death.	February Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	191	175	32	4	8	18	10	5	2	17	10	33	29	23	29	90	16
	Male	102	97	18	2	4	12	3	3	...	10	5	17	18	10	18	45	9
	Female	89	78	14	2	4	6	7	2	2	7	5	16	11	13	11	45	7
	White	187	174	31	4	8	17	10	5	2	17	10	33	27	23	29	88	16
	Colored	4	1	1	...	...	1	...	...	...	...	...	...	2	...	...	2	...
1	Typhoid fever	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
5	Smallpox	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
6	Measles	4	3	...	...	...	...	...	...	...	...	...	1	2	1	3	1	...
7	Scarlet fever	1	...	...	...	...	...	...	...	...	...	...	...	...	1	...	1	...
8	Whooping cough	2	8	...	...	...	...	...	...	...	...	...	...	2	...	1	1	...
9	Diphtheria and croup	1	1	...	...	...	...	...	...	...	1	...	...	...	...	...	1	...
10	Influenza	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
14	Dysentery	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
18	Erysipelas	2	1	...	...	...	...	...	1	...	...	...	1	...	...	1	1	...
19	Other epidemic diseases	1	...	...	...	...	...	...	...	...	...	...	...	1	...	...	1	...
20	Pus-infection and septicemia,	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
24	Tetanus	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
28	Tuberculosis of the lungs	2	3	...	...	...	...	...	...	...	...	...	...	1	1	...	2	...
29	Acute miliary tuberculosis	1	...	...	...	...	...	...	...	...	...	...	...	...	1	...	1	1
30	Tuberculous meningitis	5	6	...	...	...	...	...	...	...	...	...	2	2	1	2	3	...
31 35	Other forms of tuberculosis	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
36	Rickets	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
37	Syphilis	2	2	...	...	...	...	...	...	...	1	...	1	...	...	...	2	...
38	Gonococcus infection	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
61	Simple meningitis	5	1	...	...	...	...	1	...	...	1	...	...	2	1	1	3	...
61a	Cerebro-spinal fever	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
63a	Acute poliomyelitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
71	Convulsions	1	2	...	...	...	1	...	...	...	...	...	...	...	...	...	...	...
76	Diseases of the ears	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
79	Organic diseases of the heart,	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
89	Acute bronchitis	6	6	...	...	...	...	...	...	...	3	...	...	2	1	4	2	...
91	Broncho-pneumonia	30	21	...	...	...	...	...	1	...	2	5	13	1	8	3	27	2
92	Pneumonia	20	17	...	...	...	...	1	...	...	2	...	5	8	4	8	11	1
93	Pleurisy	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...

February Infant Mortality.—*Concluded.*

Detailed List Class Number.	Causes of Death.	February Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
103	Other diseases of stomach	1	1	...	...	...	...	...	...	...	...	...	...	1	...	....	1	...
104	Diarrhea and enteritis	13	11	...	...	...	...	...	...	1	1	3	7	1	...	1	12	...
108	Appendicitis and typhlitis	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
109	Hernias, intestinal obstruction,	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
117	Simple peritonitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
119	Acute nephritis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
143	Furuncle	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
144	Acute abscess	2	.....	...	...	...	...	...	1	...	1	...	...	...	...	....	2	1
145	Other diseases of skin, etc.	.....	2	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
150*a*	Hydrocephalus	.....	....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
b	Congenital malformations of heart.	8	16	3	...	2	2	1	...	...	...	...	...	...	...	....	.....	...
c	Other malformations	5	....	1	...	1	2	...	...	...	...	...	1	...	...	....	1	...
151*a*	Premature birth	31	39	14	3	3	4	2	2	1	2	...	...	...	...	1	4	4
b	Congenital debility	9	....	1	...	...	1	3	...	...	2	1	...	1	...	....	4	1
152*a*	Injuries at birth	14	15	10	1	...	3	...	...	...	...	...	...	...	...	....	.....	...
b	Other causes peculiar to early infancy.	10	....	3	...	1	5	1	...	...	...	...	...	...	...	....	.....	2
167	Burns (conflagrations excepted).	2	2	...	...	...	...	...	...	...	...	...	...	...	2	....	2	1
168	Absorption of deleterious gases,	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
172	Traumatism by fall	1	.....	...	...	...	...	...	...	...	...	...	...	1	...	....	1	1
182, 184	Homicide	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
187, 189	Ill-defined diseases	1	3	...	...	...	...	...	...	...	...	1	...	...	...	....	1	...
	Other causes	11	9	...	...	1	...	1	...	...	1	...	2	4	2	4	5	2
	Breast fed *	29	49	...	...	...	...	...	2	...	6	1	4	11	5	29	.....	...
	Bottle fed *	90	65	...	...	...	...	...	3	2	11	9	29	18	18	....	90	11
	Nonresidents	16	17	1	...	1	2	1	1	1	1	1	...	4	3	....	11	...

* Aged two weeks and over.

Additional Deaths for Other Months.

November, 1911.— 1 male; prematurity; white; under 1 day; residence unknown; born in United States; mother nativity, Ireland.

January, 1912.— 1 male; tuberculosis; white; 24 years; residence unknown; born in United States; mother nativity unknown.

1 female; ex. goitre; black; 45 years; residence Ward 10; birthplace unknown; mother nativity unknown.

1 male; alcoholism; white; 35 years; residence Ward 9; birthplace unknown; mother nativity unknown.

1 male; alcoholism; white; 65 years; residence unknown; birthplace unknown; mother nativity unknown.

1 male; alcoholism; white; 55 years; residence Ward 7; born in Ireland; mother nativity unknown.

1 male; pneumonia; white; 55 years; residence unknown; birthplace unknown; mother nativity unknown.

1 male; prematurity; white; under 1 day; residence unknown; born in United States; mother nativity Ireland.

1 female; prematurity; white; under 1 day; residence unknown; born in United States; mother nativity United States.

1 female; external violence; white; 40 years; residence unknown; birthplace unknown; mother nativity unknown.

MORBIDITY STATISTICS.

February, 1912. **Cases Reported.**

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum.
1	....	....	....	....	....	11	....	....	....	....	63	1	....
2	2	....	....	....	1	8	....	....	....	....	147	1	3
3	....	....	....	....	....	5	....	....	....	....	10	1	1
4	....	....	....	....	....	1	....	....	....	....	39	1	6
5	....	....	....	....	1	1	....	....	....	....	3	1	....
6	....	....	....	....	....	10	....	....	....	....	11	2	10
7	....	....	....	....	....	3	....	....	....	....	5	1	7
8	....	....	....	....	....	9	....	....	....	....	18	....	19
9	....	....	....	....	....	6	....	....	....	....	17	1	9
10	....	....	....	....	....	5	....	....	....	....	8	....	3
11	....	1	....	....	....	1	....	....	....	....	14	....	6
12	....	....	....	....	1	5	....	....	....	....	5	2	6
13	....	....	....	....	....	3	....	....	....	....	7	2	6
14	....	....	....	....	....	4	....	....	....	....	12	....	2
15	....	....	....	....	....	5	....	....	....	....	2	1	3
16	....	....	....	....	....	8	....	....	....	....	3	1	1
17	....	....	....	....	....	9	....	....	....	....	4	....	1
18	....	....	....	....	....	5	....	....	....	....	1	2	2
19	....	....	....	....	....	14	....	....	....	....	.....	1	7
20	....	....	....	....	....	12	....	....	....	....	14	8	1
21	....	....	....	....	....	11	....	....	....	....	16	1	2
22	....	....	....	....	....	10	....	....	....	....	23	1	....
23	....	....	....	....	....	4	....	....	....	....	3	1	1
24	....	....	....	....	....	8	....	....	....	....	3	1	2
25	....	....	....	....	....	1	....	....	....	....	235	1	....
26	....	....	....	....	....	1	....	....	....	....	5	1	....
Total	2	1	....	....	3	160	....	....	....	....	668	32	98
Unknown	....	....	....	....	....	1	....	....	....	....	.....	....	....
Nonresidents	....	....	....	....	2	2	....	....	....	....	2	....	6
Grand total	2	1	....	....	5	163	....	....	....	....	670	32	104
Corresponding month last year.	....	....	....	....	7	175	....	....	....	....	352	36	99

MORBIDITY STATISTICS.

Cases Reported. **February, 1912.**

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
9	....	....	....	....	3	....	1	....	9	4	....	1
9	....	....	....	....	8	2	1	....	1	15	....	2
3	....	....	....	....	10	1	....	....	.....	8	....	3
.....	....	....	....	....	6	1	....	....	2	4	....	4
1	....	....	....	....	6	3	....	....	2	1	....	5
6	....	....	....	....	21	3	1	....	8	9	....	6
1	....	....	....	....	23	....	....	....	3	.....	....	7
7	....	....	....	....	25	1	3	....	7	12	....	8
4	....	....	....	....	15	1	....	....	22	7	....	9
4	....	....	....	....	5	2	2	....	4	.....	....	10
2	....	....	....	....	3	....	....	....	19	1	....	11
7	....	....	....	....	10	2	....	....	6	1	....	12
.....	....	....	....	....	8	1	1	....	6	2	....	13
3	....	....	....	....	9	2	....	....	10	.....	....	14
4	....	....	....	....	5	1	....	....	15	1	....	15
3	....	....	....	....	10	....	....	....	8	.....	....	16
5	....	....	....	....	10	....	1	....	22	2	....	17
2	....	....	....	....	19	1	1	....	2	8	....	18
1	....	....	....	....	12	1	1	....	10	2	....	19
10	....	....	....	....	12	2	....	....	18	8	....	20
9	....	....	....	....	6	2	....	....	8	4	....	21
2	....	....	....	....	7	2	....	....	7	7	....	22
3	....	....	....	....	5	....	1	....	4	10	....	23
5	....	....	1	....	11	7	....	....	11	1	....	24
5	....	....	....	....	10	2	....	....	13	.....	....	25
.....	....	....	....	....	10	....	....	....	4	4	....	26
105	....	....	1	....	269	37	13	....	221	111	....	Total
.....	....	....	....	....	3	....	1	....	.....	.....	....	Unknown
19	*1	....	2	....	16	6	....	....	.....	.....	....	Nonresidents
124	*1	....	3	....	288	43	14	....	221	111	....	Grand total
157	....	1	2	....	259	....	17	....	76	184	....	Corresponding month last year.

* Immigrant at Quarantine.

DIVISION OF CHILD HYGIENE.

1. Medical Inspection of Schools.

Number inspections made	20,567
Number physical examinations made	10,128

There were 2,290 children excluded from school during the month ill with contagious disease as follows:

Diphtheria	3	Pediculosis	1,454
Scarlet fever	5	Trachoma	1
Measles	33	Acute or purulent conjunctivitis	38
German measles	1	Ringworm	35
Chicken pox	66	Scabies	40
Whooping cough	27	Impetigo	67
Mumps	14	Favus	4
Pulmonary tuberculosis	4	Erysipelas	2
Acute tonsilitis	141	Miscellaneous	329
Influenza	26		

There were 17,705 cases of noncontagious disease found, subdivided as follows:

Diseases of oral and respiratory tract	4,513
Diseases of eye	638
Diseases of ear	166
Diseases of skin	1,117
Dental caries	4,102
Miscellaneous	7,169

2. Physical Examination of Licensed Minors.

There were 251 children between the ages of 14 and 16 examined during this month. One hundred and sixty-two were found without defects and 87 with defects as follows:

Throat	32	Nose	2
Hearing	3	Skin	8
Sight	31	Mouth	3
Lungs (Bronchitis)	3	Miscellaneous	1
Heart	4		

Certificates were not granted to the three persons suffering with bronchitis at this time.

3. Pre-Natal and Post-Natal Work.

Pre-Natal.

Cases	59	Deaths, babies	1
Visits	234	Deaths, mothers	2
Babies born	35		

The following defective conditions were noted:

Mastitis	2	Œdema	3
Miscarriage	1	Placenta previa	1
Nephritis	2	Varicose veins	10

Mothers attended as follows:

Hospital attendance	10	Midwife	22
Family doctor	3		

Post-Natal.

Cases	47	Bottle-fed babies	6
Visits	255	Both feedings	4
Breast-fed babies	24		

Defective Conditions Noted.

Cervical abscess	1	Orthopedic defects	3
Cervical glands	2	Otitis media	6
Improper feeding	10	Skin disease	22
Ophthalmia	2	Umbilical hernia	4

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:				
Positive for diagnosis			90	
Positive for release			59	
Negative for diagnosis			1,195	
Negative for release			179	
"No growth" cultures			12—	1,535
TUBERCULOSIS:				
Positive			94	
Negative			408	
Unsatisfactory			0—	502
TYPHOID:				
Positive			6	
Negative			93	
Atypical			1—	100
GLANDERS:	Strauss.	C. F.	Ag.	
Positive	2	24	39 65	
Negative	9	75	61 145	
Unsatisfactory	2	0	0 2	
Atypical	0	4	0 4—	216
GONORRHEA:				
Positive			33	
Negative			102	
Unsatisfactory			0—	135
OTHER EXAMINATIONS:				
*Positive			11	
Negative			69	
Unsatisfactory			0—	80
BACTERIOLOGICAL MILK EXAMINATIONS			636	636
Total				3,204
SPECIAL WORK:				
Longevity of tubercle bacilli in sputa.				

* K-L Vir. organisms, typhoid urine, malaria, ophthalmia, G-U. T. B., influenza, paratyphoid, spermatozoa.

INSPECTION OF MILK, VINEGAR, ETC.

Examination as to Statute Requirements.

Samples examined,	milk from stores	572
" "	milk from wagons	378
" "	milk brought in by citizens	42
" "	milk for bacteriological examination	636
" "	vinegar	41
" "	butter and cheese	273
Total samples		1,942

INSPECTION OF DAIRIES.

Satisfactory * on first inspection	100	
Satisfactory on later inspection	649	
	—	749
Unsatisfactory on first inspection	21	
Unsatisfactory on later inspection	94	
	—	115
Total number of inspections		864
Dairies having milk rooms		439
Dairies without milk rooms		425
Number of cattle inspected		12,154
Number of dairies prohibited shipping milk to Boston because of insanitary conditions of premises		30

* "Satisfactory" means having a score of at least 45 per cent by the government score card.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	454	Cattle condemned	5,037 lbs.
Calves inspected	654	Calves condemned	436 lbs.
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	4,665	Swine condemned	3,531 lbs.

INSPECTION OF PROVISIONS.—ARTICLES CONDEMNED.

Meats.		Miscellaneous.	
Veal (tainted)	1,445 lbs.	Lobster (dead)	10 lbs.
Mutton (tainted)	340 lbs.	Fish (tainted)	59 lbs.
Beef (tainted)	2,993 lbs.	Oysters (tainted)	100 gals.
Pork (tainted)	1,881 lbs.	Vegetables (decayed)	7 bush.
Poultry (tainted)	8 lbs.	Fruit (decayed)	½ bush.

SANITARY INSPECTION DIVISION.

New reports	1,676
Reinspections	4,717
New tenement house reports	307
Nuisances reported	2,899
Legal notices	206
Court cases	7
Fines	$55
Tenements vacated	9
Milk applications approved	131
Stable permits granted	1
Stable permits refused	1
Stable hearings	2
Dump permits	7

QUARANTINE.

Vessels inspected at quarantine	44
Total immigrants arriving in Boston	987

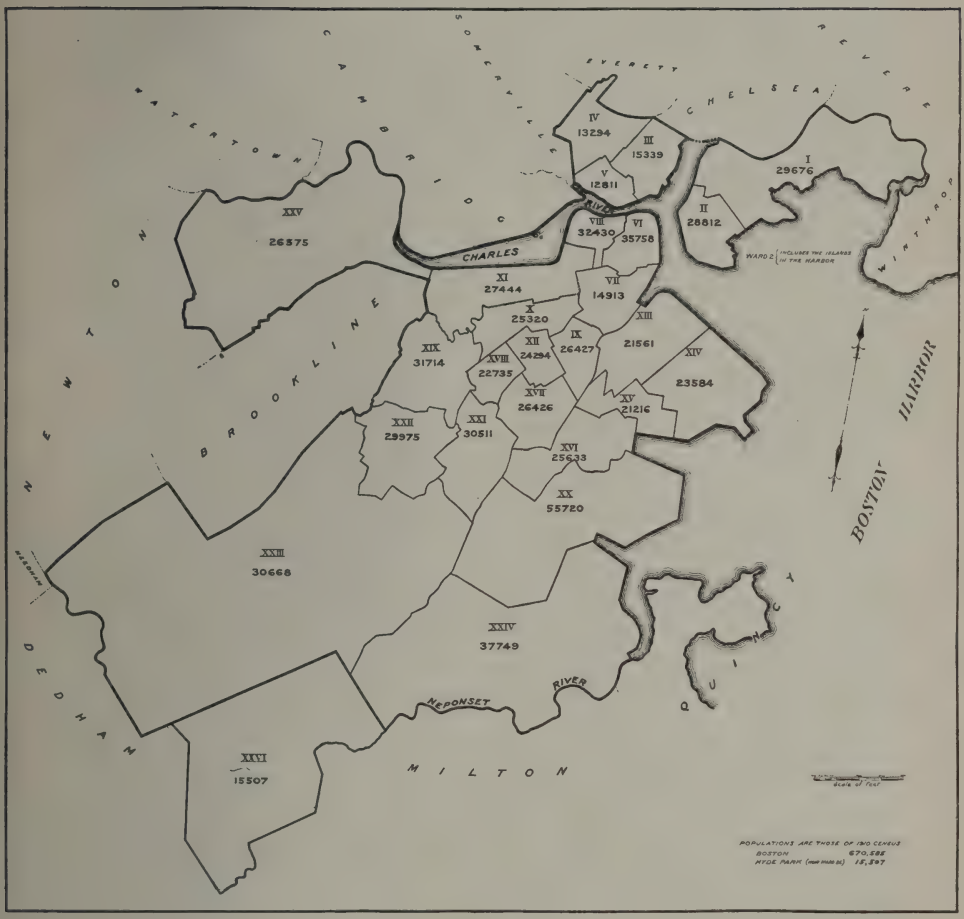
MONTHLY METEOROLOGICAL SUMMARY.

Taken at Weather Bureau, Boston, February, 1912.

Day.	Temperature, Degrees Fahrenheit.			Relative Humidity.	Daily Precipitation.	Actual Hours Sunshine.	Wind.		
	Maximum.	Minimum.	Mean.				Average Hourly Velocity. (Miles.)	Maximum Velocity. (Miles.)	Prevailing Direction.
1.....	31	19	25	62	—	10.0	13.3	21	W.
2.....	36	20	28	61	—	10.1	10.1	16	W.
3.....	30	15	22	64	—	8.5	14.2	23	W.
4.....	20	13	16	61	T.	3.9	15.2	31	N. W.
5.....	31	12	22	48	—	10.2	14.8	25	N. W.
6.....	32	21	26	62	—	—	8.2	13	N. W.
7.....	34	18	26	69	—	8.4	6.4	13	W.
8.....	34	17	26	62	T.	5.0	11.8	22	W.
9.....	24	11	18	52	—	10.4	12.5	19	W.
10.....	12	-1	6	44	—	10.4	17.8	30	W.
11.....	20	—	10	44	—	8.3	9.8	16	N. W.
12	28	8	18	46	—	8.9	12.4	18	N. W.
13.....	31	14	22	48	—	10.5	11.5	18	N. W.
14.....	33	12	22	52	—	4.9	14.2	15	S. W.
15.....	36	23	30	70	—	8.1	10.0	19	E.
16.....	34	26	30	78	.01	—	14.6	25	N.
17.....	38	24	31	65	—	2.1	5.1	11	W.
18.....	40	28	34	79	—	10.8	8.5	17	N. E.
19.....	40	31	36	86	—	6.4	7.4	12	N.
20.....	52	34	43	67	.14	6.7	11.2	16	W.
21.....	51	28	40	76	.73	—	14.2	28	E.
22.....	57	24	40	54	.28	4.6	29.9	46	W.
23.....	34	21	28	46	—	11.0	19.4	35	W.
24.....	51	31	41	47	—	6.5	10.8	22	W.
25.....	44	36	40	76	—	5.6	5.8	11	E.
26.....	37	31	34	64	.26	0.6	10.0	25	S. E.
27.....	42	27	34	80	.96	6.3	17.6	36	W.
28.....	37	24	30	48	—	11.1	15.2	26	W.
29.....	32	20	26	39	—	11.2	13.3	22	W.
Totals.....	—	—	—	—	2.38	200.5	—	—	—
Means.....	35.2	20.2	27.7	60.3	0.08	6.9	12.4	—	W.

Latitude 42 degrees 21 minutes. Longitude 71 degrees 4 minutes.

BOSTON WARD MAP.



Vol. 1 MARCH, 1912 No. 3

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF THE

CITY OF BOSTON

	Page
Vinegar and Vinegar Laws	57
Vital Statistics, March, 1912	60
Monthly reports	72

CITY OF BOSTON
PRINTING DEPARTMENT
1912

ORGANIZATION OF THE HEALTH DEPARTMENT.

SAMUEL H. DURGIN, M. D., *Chairman.*
FRANCIS X. MAHONEY, M. D.
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

ALLIED PRINTING TRADES UNION LABEL COUNCIL BOSTON, MASS.

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, MARCH, 1912. NO. 3.

VINEGAR AND VINEGAR LAWS.

BY PROF. JAMES O. JORDAN,
Inspector of Milk and Vinegar of Boston Board of Health.

Based on the experience which has come from the enforcement of laws relating to vinegar, it is apparent that it is practically impossible to frame a measure upon the lines previously followed which will check the almost universal manipulation of this product. Up to the present time it has not been found feasible to devise a law which will define cider, molasses, or any other kind of vinegar so as to effectually stop the operations of those who desire to defraud the public to their own profit. It appears that these laws really give the vinegar maker an opportunity to cheat consumers without giving the latter adequate protection. To the former these measures practically act as a license, and legalize business which, from the viewpoint of justice, is clearly wrong. Thus any law which recognizes cider vinegar safeguards the name of this article for the financial benefit of the unscrupulous manufacturer, but no law yet devised will prevent the fabrication of this product by such concerns to the financial detriment of the consumer. An effective means of removing this protection for vinegar manufacturers, and the opportunities for illegitimate profits which come from present laws, would be to so legislate that there should be only two standards for vinegar and to prohibit absolutely the use in any manner of descriptive terms, such as cider, apple, molasses, or syrup, to this commodity. If this was done the temptation to defraud would be eliminated, and the public would obtain as good and probably a superior product at a great saving of money. No doubt if a law based on this plan was adopted, consumers could save at least 10 cents on each gallon of vinegar purchased. The manufacturer could still use

any wholesome material as a source of vinegar, but the unwarranted prices which are now paid for vinegar substitutes, such as sold for cider vinegar, for illustration, would be unobtainable. In fact the blending of vinegar would soon become unknown.

The value of vinegar lies in its acetic acid content, which, if eliminated, would make the remainder unsalable, regardless of whether it was fictitious, or made from cider or some other substance; and the public is not seriously interested in whether it is cider, molasses, or some other kind of vinegar, if the acidity is present. Consequently the only standards which should be the subject of legislation in dealing with this vinegar problem are those fixing the percentage of acetic acid and prohibiting its containing anything injurious to the public health. The product ought to be sold only as vinegar, and the employment of descriptive terms, as above outlined, should not be allowed. Below is given an outline of a proposed law based on the above principles.

Section 1. Vinegar shall contain not less than four and one-half per cent by weight of absolute acetic acid and shall be free from all substances injurious to health. Whoever, himself or by his servant or agent or as the servant or agent of another person, sells, exchanges or delivers or has in his custody or possession with intent to sell, exchange or deliver, or exposes or offers for sale or exchange any vinegar containing less than four and one-half per cent by weight of absolute acetic acid or which contains substances injurious to public health, shall be punished by a fine of not more than one hundred dollars.

Sect. 2. No person who sells vinegar either by himself or by his agent shall apply in any manner any descriptive term to vinegar which indicates the substance or materials from which vinegar is made, or employ any prefix descriptive of such substance or materials in connection with the word vinegar. Whoever in the sale of vinegar by himself or by his servant or agent or by the servant or agent of another person applies, brands, bills or in any manner uses any descriptive term or employs any prefix in connection with the word vinegar, which indicates the substance or materials from which vinegar is made, or whoever by himself or by his servant or agent or as the servant or agent of another person, sells, exchanges or delivers, or has in his custody or possession with intent to sell, exchange or deliver, or exposes or offers for sale any vinegar to which any descriptive term has been applied, or prefix used in any manner which indicates the substance or materials from which vinegar is made, shall be punished by a fine of not more than one hundred dollars.

Sect. 3. Section two shall not apply to vinegar which is to be used outside of Massachusetts, but the burden of proof that any vinegar branded, marked or represented in any manner contrary to the provisions of section two is to be used outside of Massachusetts shall be upon the defendant.

While the present law must be enforced where possible to do so, it is clear that such efforts in most instances involve the

unwise expenditure of energy and also of the public funds. Much of the time now devoted to the enforcement of vinegar laws could with simpler and less legislation be more wisely directed to other channels. This vinegar issue involves commercial fraud and is not a question affecting the public health. Nevertheless the consumer is entitled to and should be accorded ample protection from the purveyors of fraudulent products.

Vinegar is now largely sold in bottles, and this is the most expensive form in which it may be purchased. The capacity of these bottles varies, and only a few of the "pint" bottles hold that amount. A number of "pint" bottles of cider vinegar which retailed at 5 cents each were recently procured, and it was found that many of them held only about ten ounces. A gallon of such cider vinegar purchased in this manner and at the above price would cost about 64 cents. By comparison with the price of 25 cents for a gallon of bulk cider vinegar, the above sum is excessive. Consumers can save money in buying vinegar if it is procured in bulk form.

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF MARCH, 1912.

Boston had in March, 1912, 1,177 deaths compared with 1,144 in March, 1911; and a death rate of 19.25 for March, 1912, against 19.55 for the corresponding month last year.

Of deaths from reportable diseases the principal decreases were scarlet fever, 14; diphtheria and croup, 9; whooping cough, 6; typhoid fever, 5; tuberculosis of the lungs, 12; and other forms of tuberculosis, 3; while the principal increase was measles, 9.

Other important differences were as follows:

March, 1912, Decreases:	
Acute bronchitis	7
Violent deaths	5
Meningitis	4
March, 1912, Increases:	
Organic heart disease and nephritis	28
Pneumonia	43
Cancer	16
Apoplexy	13
Puerperal septicemia	8

There were 4 less deaths under 1 year than in March, 1911. Under 45 years there were 2 less, and over 85 years 9 more than in March, 1911.

Ward 3 had the lowest rate, 9.08, and Ward 2 the highest rate, 22.30. Deaths of nonresidents were 138 against 143 in March, 1911.

There were marked decreases in the number of cases reported of diphtheria, scarlet fever, typhoid fever and whooping cough, while measles and varicella continued much more prevalent than a year ago. Ward 25, which had 235 cases of measles in February, reported 237 cases for the month of March and 1 death. Ward 2, which reported 153 cases in January and 147 in February, had but 56 in March with 1 death.

Four of the 11 deaths from measles in March were in Ward 6, the Italian ward.

In the first quarter of 1912 there were 72 cases of measles in Ward 6 with 8 deaths, giving a case fatality of over 11 per cent, while the case fatality for Boston in 1911 was but 1.78 per cent.

These figures again instance the high fatality of measles among Italian children.

There were 192 deaths under 1 year, which is 1 less than the average for the corresponding month for the preceding five years.

Eighty-one of these deaths were due to premature birth, congenital debility, malformations, and other diseases peculiar to early infancy; 44 to bronchitis and pneumonia; 24 to diarrhea and enteritis; 8 to reportable diseases; and 25 to other causes.

Ward 20 suffered most with 22 deaths and Ward 6 came next with 20. Of the 192 deaths, 118 were over 2 weeks old, 69 over 3 months and 43 over 6 months.

Of the 118 over 2 weeks old 74 were bottle fed.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
*Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	13 .06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	‡298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston January 1, 1912, and became Ward 26. Under "Boston," in the above table, Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau.

‡ An infant asylum is located in this ward.

March. General Summary.

	1912.	1911.
Total deaths, March	1,177	1,144
Population, estimated*	720,031	688,912
Death rate per 1,000	19.25	19.55
Deaths of nonresidents	138	143
Corrected death rate†	16.99	17.11

*Population estimated by arithmetical method used by Census Bureau.
†Nonresidents not included.

March, 1912. Statement of Deaths.

Total number (stillbirths excluded)	1,177
Sex.	
Males	619
Females	558
Condition.	
Single	531
Married	387
Widowed	248
Divorced	8
Unknown	3
Color.	
White	1,133
Black (negro or mixed)	40
Chinese	2
Indian	2
Deaths of children:	
Under one year	192
Under two years	244
Under five years	271
Stillbirths during the month,	61

Nativity.	
United States	746
Ireland	199
England and Wales	33
Scotland	10
Germany	13
Canada	81
Italy	30
Russia and Poland	33
Sweden and Norway	5
France	1
Other countries	15
Unknown	11
Nativity of Mothers.	
United States	329
Ireland	369
England and Wales	56
Scotland	16
Germany	34
Canada	105
Italy	87
Russia and Poland	55
Sweden and Norway	14
France	3
Other countries	30
Unknown	79

Abridged List Class Number.	Causes of Death.	Totals. March, 1912.	Totals. March, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes.....	1912 1,177	.....	192	52	14	9	4	271	20	13	27
		1911	1,144	196	42	19	20	6	283	29	16	26
1	Typhoid fever.....	1	6	.....	.....	.....	.....	.....	.....	.....	.....	1
3	Malarial fever.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles.....	11	2	2	7	.....	1	1	.....	.....	.....	.....
6	Scarlet fever.....	3	17	.....	.....	.....	1	.....	1	1	.....	1
7	Whooping cough.....	7	13	3	1	1	1	.....	6	1	.....	.....
8	Diphtheria and croup.....	11	20	1	3	2	1	1	8	3	.....	.....
9	Influenza.....	5	12	.....	.....	.....	.....	.....	.....	.....	.....	1
12	Other epidemic diseases.....	4	11	3	.....	.....	.....	.....	3	.....	.....	.....
13	Tuberculosis of the lungs.....	102	114	.....	5	.....	.....	.....	5	1	2	5
14	Tuberculous meningitis.....	5	9	.....	1	.....	1	.....	2	.....	.....	.....
15	Other forms of tuberculosis.....	10	9	.....	1	1	.....	.....	2	1	.....	2
16	Cancer, malignant tumor.....	82	66	.....	1	.....	.....	.....	.....	.....	.....	.....
17	Simple meningitis (except cerebro-spinal meningitis).	4	8	2	.....	.....	.....	.....	.....	1	.....	.....
17a	Cerebro-spinal meningitis.....	3	4	1	.....	.....	.....	.....	.....	1	1	.....
18	Apoplexy and softening of the brain,	62	49	2	.....	.....	.....	.....	2	.....	.....	.....
19	Organic heart diseases.....	166	129	.....	.....	.....	.....	.....	.....	3	3	6
20	Acute bronchitis.....	6	13	2	2	.....	.....	.....	4	.....	.....	.....
21	Chronic bronchitis.....	9	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	142	99	15	15	5	2	.....	37	1	.....	.....
22a	Broncho-pneumonia.....	50	51	27	7	2	.....	.....	36	2	.....	.....
23	Other respiratory diseases.....	6	18	1	1	.....	.....	.....	2	.....	.....	1
24	Diseases of the stomach (cancer excepted).	5	11	1	.....	.....	.....	.....	1	.....	.....	.....
25	Diarrhea and enteritis (under two years).	27	29	24	3	.....	.....	.....	27	.....	.....	.....
26	Appendicitis and typhlitis.....	12	10	.....	.....	.....	.....	.....	.....	1	2	.....
27	Hernia, intestinal obstruction.....	10	14	1	.....	.....	.....	.....	1	.....	.....	.....
28	Cirrhosis of liver.....	7	6	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis.....	78	87	.....	.....	.....	.....	.....	.....	.....	.....	.....
30	Diseases of women (not cancer)...	6	6	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia.....	13	5	.....	.....	.....	.....	.....	.....	.....	.....	1
32	Other puerperal diseases.....	9	8	.....	.....	.....	.....	.....	.....	.....	.....	1
33	Congenital debility and malformations.	58	51	57	.....	.....	.....	.....	57	.....	.....	.....
34	Old age.....	5	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths.....	53	61	2	2	.....	1	.....	5	2	2	3
36	Suicide.....	10	7	.....	.....	.....	.....	.....	.....	.....	.....	1
37	Other diseases.....	191	185	45	3	3	1	2	54	2	3	4
38	Ill-defined causes.....	4	9	3	.....	.....	.....	.....	3	.....	.....	.....

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex. Males.	Sex. Females.	Abridged List Class Number.
44	47	52	61	66	82	82	67	77	74	75	52	43	16	8	619	558	
28	48	64	49	60	68	79	66	73	70	75	54	41	8	7	574	570	
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	8	3	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	1	6
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	4	7
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	9	8
.....	.....	.....	.....	1	.....	.....	.....	.....	.....	2	.....	1	.....	.....	2	3	9
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	1	12
13	12	14	11	11	8	12	5	1	.....	2	.....	.....	.....	.....	61	41	13
1	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	2	14
1	1	.....	.....	.....	2	.....	.....	.....	1	.....	.....	.....	.....	.....	5	5	15
1	.....	2	2	4	13	13	9	10	10	11	6	.....	.....	.....	25	57	16
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	1	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	1	17a
.....	.....	.....	1	1	2	5	5	10	13	8	7	7	1	.....	32	30	18
2	5	7	8	6	10	10	14	17	20	15	14	15	6	5	71	95	19
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....	2	4	20
.....	.....	.....	.....	.....	.....	1	.....	1	1	2	2	1	.....	1	3	6	21
7	3	12	11	14	10	8	6	4	7	9	6	3	4	.....	93	49	22
.....	.....	.....	1	.....	.....	1	.....	1	1	3	4	1	.....	.....	27	23	22a
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	1	1	.....	1	5	23
.....	.....	.....	.....	.....	.....	1	.....	1	.....	2	.....	.....	.....	.....	2	3	24
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	13	14	25
.....	.....	.....	2	1	1	1	1	3	.....	.....	.....	.....	.....	.....	10	2	26
.....	.....	2	1	3	.....	1	.....	.....	1	.....	1	.....	.....	.....	5	5	27
.....	.....	.....	1	2	1	2	.....	.....	1	.....	.....	.....	.....	.....	5	2	28
1	3	3	9	5	8	8	8	11	6	8	5	2	1	.....	45	33	29
.....	.....	1	1	1	2	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	6	30
6	3	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	13	31
4	3	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	9	32
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	32	26	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	3	.....	1	2	3	34
3	7	.....	3	6	10	3	2	2	2	.....	2	1	.....	.....	41	12	35
1	2	2	1	.....	1	.....	2	.....	.....	.....	.....	.....	.....	.....	9	1	36
4	6	6	8	10	12	14	14	16	11	12	4	7	3	1	104	87	37
.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	2	2	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence.										
			1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	1,177	41	57	12	25	23	65	22	45	38	30	31
	Rates per 1,000 population {1912	19.25	15.28	22.30	9.08	21.56	21.02	19.96	17.72	15.99	15.78	13.59	12.28
	{1911	19.55	14.18	18.75	14.46	17.46	18.33	18.33	30.26	12.19	14.57	14.21	13.13
1	Typhoid fever	1	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	11	1	1	.....	1	.....	4	.....	.....	.....	.....	1
6	Scarlet fever	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough	7	.....	1	1	.....	.....	1	.....	.....	.....	.....	.....
8	Diphtheria and croup	11	.....	.....	.....	.....	.....	.....	.....	2	.....	1	.....
9	Influenza	5	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	4	.....	.....	.....	.....	1	.....	.....	.....	1	.....	.....
13	Tuberculosis of the lungs	102	5	5	1	7	5	6	2	6	3	1	.....
14	Tuberculous meningitis	5	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....
15	Other forms of tuberculosis	10	.....	.....	.....	.....	.....	1	.....	.....	1	1	.....
16	Cancer, malignant tumor	82	4	2	1	.....	1	.....	3	3	1	2	4
17	Simple meningitis (except cerebro-spinal meningitis).	4	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....
17a	Cerebro-spinal meningitis	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
18	Apoplexy and softening of the brain.	62	3	1	1	1	.....	1	1	.....	1	3	3
19	Organic heart diseases	166	7	3	.....	3	2	5	2	7	6	3	3
20	Acute bronchitis	6	.....	1	.....	.....	.....	3	.....	.....	.....	.....	.....
21	Chronic bronchitis	9	1	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	142	3	11	2	.....	4	17	2	3	9	6	4
22a	Broncho-pneumonia	50	2	6	1	2	.....	9	1	2	1	3	.....
23	Other respiratory diseases	6	1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	5	.....	.....	.....	.....	.....	.....	.....	.....	1	1	.....
25	Diarrhea and enteritis (under two years).	27	2	2	1	.....	.....	4	.....	.....	.....	1	.....
26	Appendicitis and typhlitis	12	.....	1	.....	.....	.....	.....	1	.....	.....	1	.....
27	Hernia, intestinal obstruction,	10	.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....
28	Cirrhosis of liver	7	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	78	2	3	.....	.....	3	2	3	5	4	2	4
30	Diseases of women (not cancer)	6	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	13	.....	.....	.....	.....	.....	.....	.....	1	2	.....	.....
32	Other puerperal diseases	9	.....	1	.....	.....	.....	.....	.....	1	.....	.....	.....
33	Congenital debility and malformations.	58	1	4	.....	3	1	5	1	3	1	2	.....
34	Old age	5	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	53	1	1	.....	3	1	4	1	1	.....	.....	1
36	Suicide	10	.....	1	.....	.....	1	.....	.....	.....	.....	.....	1
37	Other diseases	191	8	10	2	4	2	2	5	9	7	3	9
38	Ill defined causes	4	.....	1	.....	.....	1	.....	.....	.....	.....	.....	1
	Total deaths under one year	192	8	13	3	4	4	20	2	6	3	6	1

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number.
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
25	34	34	34	37	38	40	51	104	52	41	50	38	43	24	2	138	3	
11.57	18.60	16.52	18.51	15.96	16.34	20.47	18.29	19.77	18.96	15.59	18.08	11.05	17.64	17.71	....	....	....	....
17.01	24.05	13.77	18.67	15.08	16.17	19.03	18.57	20.31	14.58	18.52	12.96	15.90	17.40	.....	....	....	....	....
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	....	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	....	4
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	1	.....	.....	1	.....	....	....	....	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	.....	.....	.....	....	1	....	6
1	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	2	.....	.....	.....	....	....	....	7
1	1	.....	1	.....	1	.....	.....	3	.....	.....	.....	.....	.....	.....	....	1	....	8
2	.....	.....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	1	....	....	....	9
.....	.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....	.....	....	....	....	12
2	4	5	6	3	3	5	3	7	1	3	4	1	2	2	1	9	....	13
.....	.....	.....	.....	.....	1	.....	.....	.....	2	1	.....	.....	.....	.....	....	....	....	14
2	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	1	....	3	....	15
.....	2	2	3	3	3	.....	5	12	5	4	6	1	4	1	....	10	....	16
.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	.....	....	1	....	17
.....	.....	.....	2	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	....	....	....	17a
2	1	2	2	3	2	2	2	6	3	3	7	3	3	3	....	3	....	18
1	7	3	2	7	4	6	12	14	13	9	7	8	5	4	....	23	....	19
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	1	.....	.....	.....	.....	....	....	....	20
1	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	2	1	.....	1	....	....	....	21
4	3	5	3	2	8	5	10	8	5	3	2	4	6	2	....	11	....	22
.....	.....	.....	1	.....	1	2	.....	3	1	4	1	4	1	1	1	3	....	22a
.....	1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	....	2	....	23
.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....	1	.....	....	....	....	24
1	1	.....	.....	1	.....	.....	.....	9	.....	1	.....	.....	.....	.....	....	4	....	25
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	1	.....	....	7	....	26
.....	.....	.....	3	1	.....	.....	.....	.....	.....	.....	.....	1	1	.....	....	2	....	27
.....	.....	.....	.....	1	.....	.....	.....	1	1	.....	1	1	1	1	....	....	....	28
.....	1	4	1	2	2	4	4	10	5	1	.....	5	5	2	....	4	....	29
.....	.....	.....	.....	.....	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	....	4	....	30
.....	.....	.....	.....	1	1	1	.....	.....	1	.....	.....	.....	1	.....	....	5	....	31
.....	.....	.....	.....	.....	.....	.....	.....	1	1	1	.....	.....	1	.....	....	3	....	32
2	.....	1	2	3	4	3	3	5	1	3	2	3	1	1	....	3	....	33
.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....	1	.....	1	.....	....	....	....	34
2	5	3	3	.....	1	3	1	1	2	1	2	.....	3	.....	....	13	....	35
1	.....	1	.....	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	3	....	36
3	7	8	4	9	3	3	10	20	8	3	11	6	5	4	....	23	3	37
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	....	38
5	4	4	4	8	5	7	9	22	4	11	6	10	6	4	....	13	....	

March Infant Mortality.

Detailed List Class Number.	Causes of Death.	March Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	192	196	19	8	10	20	17	15	6	13	15	26	25	18	44	74	13
	Male	95	113	12	3	8	12	7	9	1	6	4	11	13	9	21	32	7
	Female	97	83	7	5	2	8	10	6	5	7	11	15	12	9	23	42	6
	White	184	190	19	8	9	19	17	15	6	13	14	23	23	18	41	71	12
	Colored	8	6	...	...	1	1	...	...	...	...	1	3	2	...	3	3	1
1	Typhoid fever	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
5	Smallpox	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
6	Measles	2	...	...	...	...	...	...	...	...	...	...	...	1	1	1	1	...
7	Scarlet fever	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
8	Whooping cough	3	8	...	...	...	...	...	...	...	...	2	...	...	1	2	1	...
9	Diphtheria and croup	1	1	...	...	...	...	...	...	...	...	...	...	...	1	...	1	...
10	Influenza	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
14	Dysentery	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
18	Erysipelas	2	5	...	...	...	...	...	...	...	1	...	1	...	...	1	1	...
19	Other epidemic diseases	1	...	...	...	...	...	...	...	...	...	...	...	...	1	...	1	...
20	Pus-infection and septicemia,	1	1	...	...	...	...	...	...	1	...	...	...	...	...	...	1	...
24	Tetanus	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
28	Tuberculosis of the lungs	...	3	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
29	Acute miliary tuberculosis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
30	Tuberculous meningitis	...	2	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
31 35	Other forms of tuberculosis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
36	Rickets	1	...	...	...	...	...	...	...	...	...	...	1	...	...	...	1	...
37	Syphilis	4	3	...	...	1	...	...	...	...	...	2	...	1	...	...	3	1
38	Gonococcus infection	...	3	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
61	Simple meningitis	2	2	...	...	...	...	1	...	...	...	...	1	...	...	...	1	1
61a	Cerebro-spinal fever	1	...	...	...	...	...	...	1	...	...	...	...	...	...	1	...	...
63a	Acute poliomyelitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
71	Convulsions	4	3	...	...	...	...	...	...	...	1	1	...	1	1	1	3	...
76	Diseases of the ears	2	...	...	...	...	...	...	...	...	...	...	1	1	...	...	2	...
79	Organic diseases of the heart,	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
89	Acute bronchitis	2	8	...	...	...	...	1	...	1	...	...	...	...	...	...	1	...
91	Broncho-pneumonia	27	21	...	...	...	...	1	3	1	1	2	4	9	6	13	13	2
92	Pneumonia	15	10	...	...	...	1	...	...	1	1	1	2	5	4	7	7	1
93	Pleurisy	1	...	...	...	...	...	...	...	...	...	...	...	...	1	1	...	..
103	Other diseases of stomach	1	1	...	...	...	...	...	...	...	...	...	1	...	...	1	...	...
104	Diarrhea and enteritis	24	28	...	...	...	2	3	1	...	3	4	9	1	1	2	17	3
108	Appendicitis and typhlitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
109	Hernias, intestinal obstruc-	1	4	...	...	...	...	...	...	...	...	1	...	...	...	...	1	...
117	Simple peritonitis	1	...	...	...	...	...	1	...	...	...	...	...	...	...	...	...	...

March Infant Mortality.— *Concluded.*

Detailed List Class Number.	Causes of Death.	Totals, Under 1 Year.													Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.	Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Breast Fed.	Bottle Fed.	
119	Acute nephritis		1															
143	Furuncle																	
144	Acute abscess	1											1				1	
145	Other diseases of skin, etc.	1	3						1								1	
150*a*	Hydrocephalus	1									1						1	
b	Congenital malformations of heart.	8	11	1	1	1	1	2	2							1	1	
c	Other malformations	4			1		1	1					1			1		1
151*a*	Premature birth	30	40	8	3	4	5	3	4	2				1		2	5	1
b	Congenital debility	14		2		1	2	1	1		2	1	3	1		2	6	
152*a*	Injuries at birth	10	20	3	3	3	1											1
b	Other causes peculiar to early infancy.	14		5			6	2			1					1		1
167	Burns (conflagrations excepted).	1									1					1		
168	Absorption of deleterious gases,																	
172	Traumatism by fall																	
182, 184, 187, 189	Homicide																	
	Ill-defined diseases	3	3									1	1	1		2	1	
	Other causes	9	12				1	1	2		1			3	1	4	3	1
	Breast fed *	44	41						7		7	6	7	10	7	44		1
	Bottle fed *	74	101						8	6	6	9	19	14	11		74	5
	Nonresidents	13	13			2	1	4				1	4	1		1	5	13

* Aged two weeks and over.

Additional Deaths for Other Months.

September, 1911.— 1 male; sudden death; white; 3 months; residence Ward 2; born in United States; mother nativity, United States.

October, 1911.— 1 male; accidental drowning; white; 40 years; residence unknown; birthplace unknown; mother nativity unknown.

December, 1911.— 1 male; disease of veins; white; 50 years; residence Ward 19; born in Ireland; mother nativity, Ireland.

1 female; ill defined; white; 1 month; residence Ward 9; born in United States; mother nativity, Italy.

1 male; suicide by drowning; white; 21 years; residence Ward 21; born in United States; mother nativity, United States.

1 male; suicide by firearms; white; 30 yrs.; residence unknown; birthplace unknown; mother nativity unknown.

1 female; homicide; white; 21 years; residence Ward 23; born in Canada; mother nativity, Canada.

January, 1912.— 1 male; alcoholism; black; 63 years; residence Ward 11; birthplace unknown; mother nativity unknown.

1 male; alcoholism; white; 36 years; nonresident; born in United States; mother nativity unknown.

February, 1912.— 1 male; tuberculosis; white; 40 years; residence Ward 7; birthplace unknown; mother nativity unknown.

1 female; tuberculosis; white; 53 years; residence Ward 9; born in United States; mother nativity unknown.

1 female; alcoholism; white; 27 years; residence Boston; born in United States; mother nativity unknown.

1 female; alcoholism; white; 32 years; residence Ward 8; born in Canada; mother nativity unknown.

1 female; pericarditis; white; 52 years; residence Ward 12; birthplace unknown; mother nativity unknown.

1 male; organic disease of heart; white; 69 years; residence Ward 10; born in United States; mother nativity, United States.

1 female; organic disease of heart; white; 30 years; residence unknown; birthplace unknown; mother nativity unknown.

1 male; pneumonia; white; 26 years; residence Ward 18; born in Ireland; mother nativity, Ireland.

1 male; diarrhea and enteritis; white; 3 months; residence Ward 18; born in United States; mother nativity, Canada.

1 male; simple peritonitis; white; 47 years; residence Ward 15; born in Canada; mother nativity, Ireland.

1 female; suicide by poisoning; white; 55 years; residence Ward 20; born in United States; mother nativity, England and Wales.

1 male; suicide by firearms; white; 40 years; residence unknown; birthplace unknown; mother nativity unknown.

1 male; traumatism by cutting, etc.; white; 47 years; residence Ward 8; born in Ireland; mother nativity, Ireland.

1 male; homicide; white; 20 years; residence Ward 20; born in United States; mother nativity, Ireland.

MORBIDITY STATISTICS.

March, 1912. **Cases Reported.**

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum.
1	....	....	....	....	....	9	....	....	....	....	39	....	....
2	....	....	....	....	....	10	....	....	....	1	56	....	11
3	....	....	....	....	....	....	....	....	....	....	2	1	2
4	....	....	....	....	....	....	....	....	....	....	31	1	....
5	....	....	....	....	....	1	....	....	....	1	3	....	1
6	3	....	....	....	....	13	....	....	....	....	38	1	11
7	....	....	....	....	....	2	....	....	....	....	3	1	11
8	....	....	....	....	1	13	....	....	....	....	32	1	21
9	....	....	....	....	....	2	....	....	....	....	37	1	11
10	....	....	....	....	....	3	....	....	....	....	8	....	2
11	....	....	....	....	....	2	....	....	....	....	9	4	1
12	....	....	....	....	....	4	....	....	....	....	19	1	2
13	....	....	....	....	1	3	....	....	....	....	32	3	5
14	1	....	....	....	....	2	....	....	....	....	26	1	5
15	....	....	....	....	2	5	....	....	....	....	24	2	1
16	....	....	....	....	....	9	....	....	....	....	11	....	2
17	....	....	....	....	1	14	....	....	....	....	7	1	3
18	....	....	....	....	....	1	....	....	....	....	14	....	2
19	....	....	....	....	....	7	....	....	....	....	5	2	1
20	....	....	....	....	....	12	....	....	....	....	11	10	8
21	....	....	....	....	1	3	....	....	....	....	49	3	....
22	....	....	....	....	....	2	....	....	....	....	19	3	2
23	....	....	....	....	....	2	....	....	....	....	10	1	....
24	....	....	....	....	....	2	....	....	....	....	6	1	4
25	....	....	....	....	....	1	....	....	....	....	237	....	....
26	....	....	....	....	....	....	....	....	....	....	7	1	....
Total	4	....	....	....	6	122	....	....	....	2	735	39	106
Unknown	....	....	....	....	....	....	....	....	....	....	....	....	....
Nonresidents	....	....	....	....	....	5	....	....	....	....	9	....	6
Grand total	4	....	....	....	6	127	....	....	....	2	744	39	112
Corresponding month last year.	....	....	....	....	6	190	....	....	....	....	651	56	119

MORBIDITY STATISTICS.

Cases Reported. **March, 1912.**

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
7	....	....	....	....	6	....	2	....	2	8	....	1
9	....	....	....	....	19	1	....	....	6	6	....	2
2	....	....	....	....	5	1	1	....	.....	3	....	3
5	....	....	....	....	7	1	....	....	.....	7	....	4
2	....	....	....	....	8	1	....	....	.....	1	....	5
2	....	....	....	....	22	3	....	....	20	14	....	6
5	....	....	....	....	19	1	....	....	25	.....	....	7
10	....	....	2	....	13	2	....	....	14	4	....	8
3	....	....	....	....	25	1	1	....	19	2	....	9
1	....	....	....	....	8	1	....	....	2	1	....	10
4	....	....	....	....	2	2	2	....	4	1	....	11
4	....	....	....	....	19	5	1	....	4	2	....	12
5	....	....	....	....	14	1	1	....	5	.....	....	13
3	....	....	....	....	12	....	....	....	3	1	....	14
3	....	....	....	....	10	....	....	....	13	.....	....	15
3	....	....	....	....	4	2	....	....	8	.....	....	16
7	....	....	....	....	7	1	....	....	13	1	....	17
6	....	....	....	....	11	....	....	....	9	4	....	18
5	....	....	....	....	13	1	1	....	1	1	....	19
8	....	....	....	3	15	1	4	....	20	5	....	20
7	....	....	....	....	4	1	....	....	11	4	....	21
2	....	....	....	....	7	1	....	....	5	7	....	22
2	....	....	....	....	9	....	1	....	.....	14	....	23
7	....	....	....	....	6	....	2	....	12	15	....	24
8	....	....	....	....	4	1	....	....	10	1	....	25
4	....	....	....	....	1	1	....	....	2	.....	....	26
124	....	....	2	3	270	29	16	....	208	102	....	Total
.....	....	....	....	....	3	....	....	....	.....	.....	....	Unknown
6	....	....	....	....	10	3	1	....	4	.....	....	Nonresidents
130	....	....	2	3	283	32	17	....	212	102	....	Grand total
204	....	2	4	....	316	....	33	....	72	194	....	Corresponding month last year.

DIVISION OF CHILD HYGIENE.

1. Medical Inspection of Schools.

Number inspections made	21,997
Number physical examinations made	7,246

There were 3,548 children excluded from school during the month, ill with contagious disease, as follows:

Diphtheria	4	Syphilis	1
Scarlet fever	3	Pediculosis	2,827
Measles	23	Acute or purulent conjunctivitis	57
German measles	3	Ringworm	49
Chicken pox	50	Scabies	41
Whooping cough	13	Impetigo	81
Mumps	4	Erysipelas	1
Pulmonary tuberculosis (suspected)	3	Molluscum contagiosum	1
Acute tonsilitis	108	Miscellaneous	257
Influenza	22		

There were 16,331 cases of noncontagious disease found, subdivided as follows:

Diseases of oral and respiratory tract	4,039
Diseases of eye	642
Diseases of ear	244
Diseases of skin	1,232
Dental caries	3,915
Miscellaneous	6,259

2. Physical Examination of Licensed Minors.

There were 299 children between the ages of 14 and 16 examined during this month. One hundred and twenty-five were found without defects and 174 with defects as follows:

Throat	44	Lungs (Bronchitis)	4
Hearing	2	Heart	2
Sight	43	Nose	1
Hair	1	Skin	6
Mouth and lips	96	Miscellaneous	2

3. Pre-Natal and Post-Natal Work.

Pre-Natal.

Cases	31	Babies born	48
Visits	224	Deaths, babies	5

The following defective conditions were noted:

Eclampsia threatened	2	Œdema	4
Nephritis	1	Varicose veins	6

Mothers attended as follows:

Family doctor	6	Midwife	24
Hospital attendance	18		

Post-Natal.

Cases	29	Bottle-fed babies	1
Visits	428	Both feedings	3
Breast-fed babies	39		

Defective Conditions Noted.

Cervical abscess	5	Orthopedic defects	9
Cervical glands	4	Otitis media	4
Defective speech	1	Skin disease	9
Improper feeding	11	Tuberculosis, mother	1
Ophthalmia	5	Umbilical hernia	2

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:			
Positive for diagnosis	82		
Positive for release	64		
Negative for diagnosis	1,043		
Negative for release	183		
"No growth" cultures		12—	1,384
TUBERCULOSIS:			
Positive	104		
Negative	499		
Unsatisfactory		0—	603
TYPHOID:			
Positive	12		
Negative	83		
Atypical		3—	98

GLANDERS:	Strauss.	C. F.	Ag.		
Positive	3	13	17	33	
Negative	13	10	10	33	
Unsatisfactory	2	1	1	4	
Atypical	0	2	0	2—	72

GONORRHEA:			
Positive	35		
Negative	134		
Unsatisfactory		0—	169
OTHER EXAMINATIONS:			
*Positive	19		
Negative	85		
Unsatisfactory		0—	104
BACTERIOLOGICAL MILK EXAMINATIONS			883
Total			3,313

SPECIAL WORK:
Longevity of tubercle bacilli in sputum.

* K-L Vir. organisms, malaria, ophthalmia, G-U. T.B., paratyphoid, Eosinophiliä, Mange Parasite, Anthrax.

INSPECTION OF MILK, VINEGAR, ETC.
Examination as to Statute Requirements.

Samples examined, milk from stores	760
" " milk from wagons	625
" " milk brought in by citizens	56
" " milk for bacteriological examination	883
" " vinegar	53
" " butter and cheese	299
Total samples	2,676

INSPECTION OF DAIRIES.

Satisfactory * on first inspection	202	
Satisfactory on later inspection	471	
		673
Unsatisfactory on first inspection	58	
Unsatisfactory on later inspection	35	
		93
Total number of inspections		766
Dairies having milk rooms	391	
Dairies without milk rooms	375	
Number of cattle inspected	8,047	
Number of dairies prohibited shipping milk to Boston because of insanitary conditions of premises	35	

* "Satisfactory" means having a score of at least 45 per cent by the government score card.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	472	Cattle condemned (5 and parts),	2,239 lbs.
Calves inspected	2,262	Calves condemned (63)	2,309 lbs.
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	3,899	Swine condemned (31 and parts),	5,289 lbs.

INSPECTION OF PROVISIONS.—ARTICLES CONDEMNED.

Meats.

Veal (immature)	100 lbs.
Mutton (tainted)	22 lbs.
Beef (tainted)	415 lbs.
Pork (tainted)	126 lbs.
Poultry (tainted)	290 lbs.

Miscellaneous.

Lobster (dead)	5 lbs.
Fish (tainted)	233 lbs.
Fruit (decayed)	2 bush.
Vegetables (decayed)	8,213 bush.
Cereals	500 lbs.
Nuts	50 lbs.
Cheese	16 lbs.
Canned goods	36 cans.

SANITARY INSPECTION DIVISION.

New reports	2,034
Reinspections	5,841
New tenement house reports	218
Nuisances reported	3,446
Legal notices	268
Court cases	11
Fines	$220
Tenements vacated	0
Milk applications approved	2,800
Houses demolished	5
Stable permits granted	0
Stable hearings	1
Dump permits	7

QUARANTINE.

Vessels inspected at quarantine	58
Total immigrants arriving in Boston	3,999

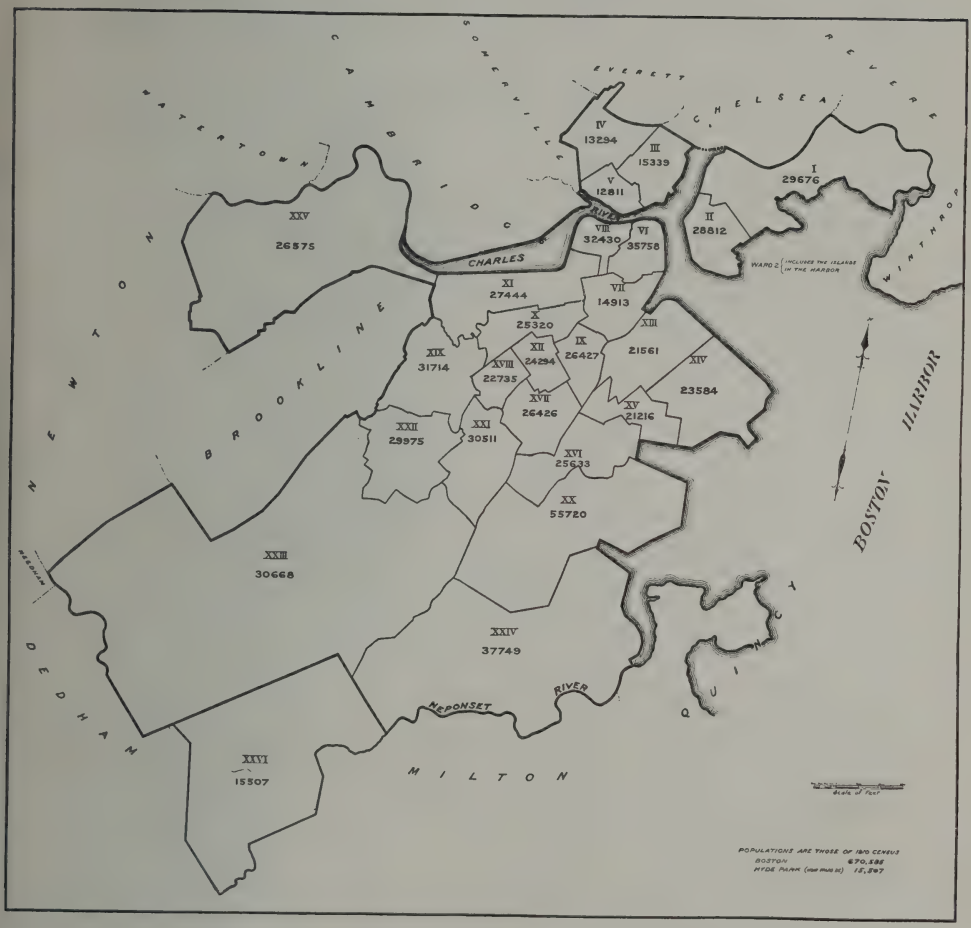
MONTHLY METEOROLOGICAL SUMMARY.

Taken at Weather Bureau, Boston, March, 1912.

Day.	Temperature, Degrees Fahrenheit.			Relative Humidity.	Daily Precipitation.	Actual Hours Sunshine.	Wind.		
	Maximum.	Minimum.	Mean.				Average Hourly Velocity. (Miles.)	Maximum Velocity. (Miles.)	Prevailing Direction.
1.....	31	18	24	43	—	9.4	11.6	21	W.
2.....	27	14	20	56	—	11.0	18.2	32	N. W.
3.....	28	12	20	40	—	11.0	14.1	23	N. W.
4.....	24	11	18	64	.01	8.5	8.4	15	E.
5.....	25	19	22	62	.01	9.8	9.1	17	N.
6.....	30	15	22	74	.03	6.1	6.7	11	N. W.
7.....	36	28	32	94	.04	—	11.8	19	N.
8.....	47	33	40	75	.02	6.5	7.2	14	S. W.
9.....	49	33	41	78	T.	1.3	9.8	20	S. W.
10.....	38	23	30	52	—	11.7	17.4	27	N. W.
11.....	41	22	32	31	—	11.7	11.2	22	N. W.
12	41	32	36	84	.22	—	7.8	16	S. W.
13.....	54	37	46	84	.92	—	13.0	28	W.
14.....	52	34	43	47	—	11.9	11.8	20	W.
15.....	62	35	48	98	.64	—	17.2	47	S. W.
16.....	56	38	47	60	—	9.2	13.5	26	N. W.
17.....	55	34	44	56	—	12.0	8.1	18	S.
18.....	62	38	50	67	—	8.2	11.2	19	S. W.
19.....	59	37	48	64	T.	12.1	9.9	19	S. W.
20.....	57	23	40	84	.16	9.6	15.2	31	W.
21.....	25	19	22	88	.36	—	11.1	20	N.
22.....	35	20	28	70	—	10.1	13.3	30	N. W.
23.....	41	22	32	53	—	12.3	9.4	14	W.
24.....	37	31	34	95	.78	—	10.5	26	N.
25.....	38	21	30	54	.06	8.1	14.4	28	N. N. W.
26.....	38	19	28	64	T.	10.9	9.5	18	S. W.
27.....	53	36	44	56	—	12.5	8.8	16	W.
28.....	60	41	50	68	T.	9.9	7.2	14	W.
29.....	61	42	52	88	.93	.6	13.5	37	S. E.
30.....	53	34	44	36	—	12.6	12.2	28	N. W.
31.....	64	36	50	50	—	11.5	11.2	22	S. W.
Totals.....	1,379	857	1,117	2,035	4.18	238.5	354.3	47	—
Means.....	44.5	27.6	36.0	65.6	0.13	7.7	11.4	S. W.	N. W.

Latitude 42 degrees 21 minutes. Longitude 71 degrees 4 minutes.

BOSTON WARD MAP.



Vol. 1 APRIL, 1912 No. 4

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF THE

CITY OF BOSTON

	Page
Prevention of Infant Mortality	79
Vital Statistics, April, 1912	85
Monthly reports	96

CITY OF BOSTON
PRINTING DEPARTMENT
1912

ORGANIZATION OF THE HEALTH DEPARTMENT.

SAMUEL H. DURGIN, M. D., *Chairman.*
FRANCIS X. MAHONEY, M. D.
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

ALLIED PRINTING TRADES UNION LABEL COUNCIL BOSTON MASS

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, APRIL, 1912. No. 4.

PREVENTION OF INFANT MORTALITY.

BY WILLIAM J. GALLIVAN, M. D.

Chief of the Division of Child Hygiene, Boston Board of Health.

In a very interesting paper published in the January number of the *Monthly Bulletin*, Dr. William H. Davis, Vital Statistician of the Boston Health Department, reports that for the year ending December 31, 1911, there were 2,245 deaths of infants under one year of age.

Of this number, 646 infants died before reaching the age of two weeks, and 1,599 infants died between the ages of two weeks and one year, while of those between the ages of two weeks and one year, 413 were breast fed and 1,186 bottle fed.

The principal causes of death of infants in 1911 were as follows:

Table No. 1.

MORTALITY OF INFANTS AND CAUSE OF DEATH.

Diarrhœa and enteritis	627
Bronchitis	44
Broncho-Pneumonia	190
Tuberculosis (all forms)	54
Whooping cough	52
Meningitis	30
Erysipelas	14
Dysentery	9
Measles	17
Syphilis	39
Convulsions	18
Other diseases	1,151

The time of the year when infant mortality is the highest is shown in the following table:

Table No. 2.

January	162	July	280
February	175	August	260
March	196	September	224
April	191	October	172
May	181	November	138
June	129	December	137

So, the conclusion is forced on us that a great many babies die in Boston; that a great proportion of these deaths occur in the summer months, and finally that a large percentage of these deaths is among babies who are bottle fed.

Until quite recently the only activity displayed by the municipal authorities toward the prevention of infant mortality has been the circulation of the following pamphlet which is sent by the City Registrar, Edward W. McGlenen, to the mother of every baby born in Boston.

OFFICE OF THE BOSTON BOARD OF HEALTH.

The Board of Health of this city recommends the following rules for mothers with little babies.

If they are followed carefully, many of the large number of little babies who die annually in Boston can be saved.

Mothers with little babies. Read this and do just as it says for the sake of your baby's health.

THE BEST FOOD IS MOTHER'S MILK.

Nurse your baby for the *first twelve months.* If you do, its chances for life and health will be ten times greater than the chances of a bottle-fed baby. Never wean a baby less than a year old, except at the doctor's advice. Do not wean a baby in hot weather.

NURSE YOUR BABY AT REGULAR TIMES.

But never more than once in two hours. Baby should sleep six hours or more each night without being waked. Wake baby promptly if asleep when the regular time for nursing comes. Give baby all the cool boiled water it wants. Baby may cry because you feed it too often and too much; because it wants water; because it aches from too much handling; because it is too hot — flannel shirts in summer bring prickly heat.

MILK.

If you think you cannot nurse your baby enough, or at all, consult a doctor before making any change. The question is too serious for you to decide

by yourself. Buy good, clean milk and prepare it just as the doctor directs, or get it already prepared from the milk stations. Keep the milk cold, covered and clean. Put it in clean bottles. Never use a feeding bottle with a tube on it. Never give baby cheap, dirty milk, or coffee, beer, syrups or solid food.

Clothing.

In hot weather one thin piece is enough. Baby feels heat more than you. Keep baby cool.— It will not catch cold.

Bathing.

Wash baby all over every morning. In hot weather sponge it often with cool water.

Fresh Air.

Keep the windows open day and night. In summer sleep on the roof or in the yard with baby, if you can. Baby should sleep alone and in the coolest, quietest room. Keep baby out of the kitchen. Keep flies out of the house and protect baby from them. Go to the parks as often as you can, even for a few moments.

When you Cannot Nurse your Baby

And you want to keep it well, consult your physician before using any milk or patent food.

If Baby is Sick, Vomits or has Diarrhea.

Stop feeding altogether, give it water instead, and take it to your doctor or to some children's hospital or dispensary.

The Board of Health also indorses the modified milk which can be obtained at the following places:

No Milk Sold for Sick Babies Without a Doctor's Order.

494 Rutherford avenue, Charlestown.
24 Anson street, Forest Hills.
7 Beacon street, Boston.
70 Huntington avenue, Boston.
701 Tremont street, Boston.
361 Hanover street, Boston.
195 Chambers street, Boston.
329 Harrison avenue, Boston.
81 West Cedar street, Boston.
64 Porter street, East Boston.
403 West Broadway, South Boston.
164 Main street, Charlestown.
218 Bowdoin street, Dorchester.
352 Blue Hill avenue, Roxbury.

A deposit of 2 cents is required on all bottles.

Number.		Fat.	Sugar.	Protein.	Lime Water.
AA	Under 1 month old	2.50%	5.50%	0.80%	5.0%
A	From 1 to 4 months old	3.00%	6.50%	1.30%	5.0%
B	From 4 to 8 months old	3.40%	6.50%	1.70%	5.0%
C	Over 8 months old	4.00%	6.00%	2.50%	5.0%

D Whole milk from tuberculin tested cows, 4 cents per pint; 8 cents per quart jar.

Prices: Two cents for a 2, 4 or 6-ounce bottle. Two and one-half cents for an 8-ounce bottle.

Your physician should advise you as to the formulæ needed.

The Board of Health indorses the work of the Milk and Baby Hygiene Association which has established the following stations where *free advice* from physicians and nurses, and modified milk may be obtained:

North End Union . . . . . 20 Parmenter street, Boston
Elizabeth Peabody House . . . . . 87 Poplar street, Boston
Denison House . . . . . 93 Tyler street, Boston
South Bay Union . . . . . 640 Harrison avenue, Boston
Lincoln House . . . . . 70 Emerald street, Boston
Old Armory . . . . Maverick and Bremen streets, East Boston
Ward Room . corner Bunker Hill and Lexington streets, Charlestown
Court House . . . . . 125 Dorchester street, South Boston
Roxbury Crossing . . . . . 1049 Columbus avenue, Roxbury

How to Get Pure Milk.

Take the baby to one of the above stations or to your physician, for examination and advice, as to the kind of milk suitable for your particular baby.

Price.—Four ounces, 2 cents; 6 ounces, 3 cents; 8 ounces, 3½ cents; 16 ounces 1 (pint), 6 cents, all formulæ. Deposit of 2 cents on each bottle required.

Whole milk of very high grade is sold at *ten cents a quart* for the benefit of pregnant women, nursing mothers, older children and for mothers who wish to modify milk at home for their babies.

Adapted from the circular issued by the Milk and Baby Hygiene Association.

With this exception, all efforts toward the prevention of infant mortality in Boston have been undertaken by private

charities. They have accomplished excellent results, and they deserve the commendation and support of the public.

Despite their efforts the number of infants who die in Boston from preventable disease is still too large; and the Division of Child Hygiene has made plans for a campaign against infant mortality. Conferences have been held with the various associations who have been engaged in this work in order to secure cooperation and to avoid a reduplication of effort and expense. These conferences have been very helpful and we look forward to a greatly reduced death rate among infants owing to this combined effort.

Chapter 280, Acts of 1912 requires physicians to report the births of babies within forty-eight hours of said birth. Profiting by this information, the Division of Child Hygiene has compiled a list of babies born in Boston since January 1, 1912. To the mother of every such baby is sent the following circular:

HEALTH DEPARTMENT.
100 SUMMER STREET, BOSTON.

DEAR MADAM,—

To assist the Board of Health in its campaign to save the babies of Boston, will you please answer the following questions regarding your baby born on.....1912, and return this slip at once in the inclosed envelope.

Is your baby breast fed? (Answer yes or no.).....
Is your baby bottle fed? (Answer yes or no.).....
If bottle fed, what food is being used?.....

Yours truly,
F. H. SLACK, Secretary.

The replies to this circular are being received daily and the spirit of cooperation shown by these mothers in promptly replying is highly encouraging for successful work. An additional list of every baby born since May, 1911, is under preparation by this division.

Ten nurses will soon be assigned to the work of prevention of infant mortality. These nurses will be assigned as follows:

Wards 1 and 2	One nurse.
Wards 3, 4 and 5	One nurse.
Ward 6	Two nurses.
Wards 7, 9, 10 and 12	One nurse.
Wards 8, 11 and 25	One nurse.
Wards 13, 14 and 15	One nurse.
Wards 17, 18 and 19	One nurse.
Wards 16, 20 and 24	One nurse.
Wards 21, 22, 23 and 26	One nurse.

These nurses will be expected to have accurate information concerning every baby in the district assigned to them.

Breast-fed babies will cause little or no anxiety. The nurse will visit these cases to make sure that breast feeding is maintained; to advise the mother on the care of the breasts; and on general hygienic rules for the preservation of her milk and the care of the baby.

Bottle babies who are under the care of the family physician will be visited by the nurse to make sure that such care is continuous; the services of the nurse will be offered to the tired out mother in assisting in preparing the baby's food and in carrying out the directions of the family physician. It is expected that the bulk of the work will be among the bottle babies of those who are unable to employ a physician. Recommendations will be made to these mothers to place their babies under the care of the nearest pediatric clinic, at once, before they show any signs of illness. Every assistance will be rendered these mothers by the nurses in carrying out the advice and instructions given at the clinic and unceasing attention will be given by the nurses to the sick babies of this class, particularly during the summer months.

The Division of Child Hygiene is entitled only to a portion of the money appropriated for the maintenance of the Board of Health. The erection of tents at the seashore, the employment of additional nurses in such tents to assist in the care of sick babies, the maintenance of milk stations have been considered, but the amount of money available for this division prohibits the undertaking of such projects this year.

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF APRIL, 1912.

Boston had 1,036 deaths in April, compared with 1,060 for April of last year, and a death rate of 17.51 against 18.72 for April, 1911.

Of deaths from reportable diseases the principal decreases were tuberculosis (all forms), 10; diphtheria, 10; scarlet fever, 6; whooping cough, 2; typhoid fever, 2; while the principal increase was measles, 7.

Other important differences were as follows:

April, 1912, Decreases:	
Diarrhoea and enteritis (under 2 years)	26
Bronchitis	14
Hernia and intestinal obstruction	8
Cancer	6
April, 1912, Increases:	
Organic heart diseases	33
Broncho pneumonia	17
Brights disease and nephritis	8

There were 33 less deaths under 1 year than in April, 1911, and over 75 years 17 more than in April of last year.

Ward 10 had the lowest rate, 10.77, and Ward 6 the highest, 22.54. Deaths of nonresidents were 96 against 110 in April, 1911.

There were marked decreases in the number of cases reported of diphtheria, scarlet fever and whooping cough, while more cases of measles, tuberculosis and varicella were reported than in April, 1911. Ward 6, the Italian ward, reported 98 cases and 6 deaths from measles during the month.

There were 158 deaths under 1 year, which is 16 less than the average for the corresponding month for the preceding five years.

Fifty-eight of these deaths were due to premature birth, congenital debility, malformations, and other diseases peculiar to early infancy; 33 to bronchitis and pneumonia; 21 to diarrhoea and enteritis; 16 to reportable diseases; and 30 to other causes. Of these deaths under 1 year, Ward 20 furnished the largest number, 23; and Ward 6 came next with 20; 112 were over 2 weeks old, 67 over 3 months, and 37 over 6 months.

Of the 112 over 2 weeks old 78 were bottle fed.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
* Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	13 .06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	‡298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston January 1, 1912, and became Ward 26. Under "Boston," in the above table, Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau.

‡ An infant asylum is located in this ward.

April. General Summary.

	1912.	1911.
Total deaths, April	1,036	1,060
Population, estimated*	720,031	688,912
Death rate per 1,000	17.51	18.72
Deaths of nonresidents	96	110
Corrected death rate†	15.88	16.78

*Population estimated by arithmetical method used by Census Bureau.
†Nonresidents not included.

April, 1912. Statement of Deaths.

Total number (stillbirths excluded)	1,036
Sex.	
Males	521
Females	515
Condition.	
Single	477
Married	322
Widowed	230
Divorced	3
Unknown	4
Color.	
White	1,006
Black (negro or mixed)	30
Chinese	—
Deaths of children:	
Under one year	158
Under two years	212
Under five years	237
Stillbirths during the month,	53

Nativity.	
United States	618
Ireland	177
England and Wales	29
Scotland	15
Germany	16
Canada	82
Italy	42
Russia and Poland	31
Sweden and Norway	6
France	1
Other countries	12
Unknown	7
Nativity of Mothers.	
United States	284
Ireland	329
England and Wales	37
Scotland	19
Germany	30
Canada	94
Italy	95
Russia and Poland	53
Sweden and Norway	5
France	0
Other countries	20
Unknown	70

Abridged List Class Number.	Causes of Death.	Totals. April, 1912.	Totals. April, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes	1912: 1,036	.....	158	54	16	5	4	237	19	9	22
		1911:	1,060	191	42	14	12	9	268	20	12	17
1	Typhoid fever	2	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	13	6	5	6	2	.....	.....	13	.....	.....	.....
6	Scarlet fever	4	10	.....	1	.....	1	1	3	.....	.....	.....
7	Whooping cough	10	12	5	3	1	.....	.....	9	1	.....	.....
8	Diphtheria and croup	9	19	1	3	1	1	.....	6	2	1	.....
9	Influenza	5	6	1	.....	.....	.....	.....	1	.....	.....	.....
12	Other epidemic diseases	6	10	2	.....	.....	.....	.....	2	.....	.....	.....
13	Tuberculosis of the lungs	109	113	1	1	.....	.....	.....	2	1	1	7
14	Tuberculous meningitis	10	11	1	5	1	.....	.....	7	1	1	.....
15	Other forms of tuberculosis	1	6	.....	.....	.....	1	.....	1	.....	.....	.....
16	Cancer, malignant tumor	64	70	.....	.....	.....	.....	.....	.....	.....	1	.....
17	Simple meningitis (except cerebro-spinal meningitis).	7	8	3	.....	.....	.....	1	4	.....	.....	1
17a	Cerebro-spinal meningitis	4	3	2	.....	.....	.....	.....	2	.....	.....	.....
18	Apoplexy and softening of the brain	61	59	.....	.....	.....	.....	.....	.....	.....	.....	.....
19	Organic heart diseases	153	120	.....	.....	.....	.....	.....	.....	3	2	4
20	Acute bronchitis	6	12	1	.....	.....	.....	.....	1	.....	.....	.....
21	Chronic bronchitis	2	10	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	105	103	13	10	2	1	.....	26	.....	1	5
22a	Broncho-pneumonia	52	35	19	17	4	1	.....	41	3	.....	.....
23	Other respiratory diseases	8	9	.....	1	.....	.....	.....	1	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	11	14	2	.....	.....	.....	.....	2	2	.....	.....
25	Diarrhea and enteritis (under two years).	23	49	21	2	.....	.....	.....	23	.....	.....	.....
26	Appendicitis and typhlitis	9	7	1	.....	.....	.....	.....	1	.....	1	.....
27	Hernia, intestinal obstruction	4	12	.....	.....	.....	.....	.....	.....	.....	.....	.....
28	Cirrhosis of liver	5	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	74	66	1	.....	.....	.....	.....	1	.....	.....	.....
30	Diseases of women (not cancer)	6	8	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	5	7	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	4	9	.....	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	50	47	49	.....	.....	.....	.....	49	.....	.....	1
34	Old age	4	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	44	48	2	.....	2	.....	1	5	2	.....	3
36	Suicide	11	8	.....	.....	.....	.....	.....	.....	.....	.....	1
37	Other diseases	152	147	27	5	3	.....	1	36	4	1	.....
38	Ill-defined causes	3	4	1	.....	.....	.....	.....	1	.....	.....	.....

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex. Males.	Sex. Females.	Abridged List Class Number.
32	37	51	68	51	60	74	69	69	76	57	56	26	13	10	521	515	
27	49	54	59	62	57	56	67	78	77	69	44	26	14	4	538	522	
.....	.....	.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	8	5	5
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	2	6
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	5	7
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	4	8
.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	3	.....	.....	.....	2	3	9
.....	.....	1	.....	1	.....	1	.....	.....	.....	1	.....	.....	.....	.....	5	1	12
12	13	9	17	9	8	12	4	7	4	2	1	.....	.....	.....	57	52	13
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	6	4	14
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	15
.....	1	1	3	6	6	8	9	8	8	5	6	1	1	.....	19	45	16
1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	5	17
1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	.....	17a
.....	1	.....	3	3	4	4	7	7	7	7	8	5	3	2	26	35	18
1	4	7	7	9	12	14	12	10	20	12	17	10	5	4	71	82	19
.....	.....	.....	.....	.....	.....	.....	1	.....	.....	2	1	1	.....	.....	1	5	20
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	.....	.....	.....	.....	1	1	21
3	.....	6	8	6	8	7	7	11	9	3	3	2	.....	.....	64	41	22
.....	.....	.....	.....	.....	.....	2	1	2	1	1	.....	1	.....	.....	22	30	22a
.....	.....	.....	1	.....	.....	.....	1	1	2	1	1	.....	.....	.....	2	6	23
.....	1	1	.....	.....	.....	1	.....	1	.....	1	.....	1	.....	1	3	8	24
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	11	12	25
1	2	.....	2	.....	1	1	.....	.....	.....	.....	.....	.....	.....	.....	7	2	26
.....	.....	.....	1	.....	.....	.....	1	1	.....	.....	.....	.....	1	.....	.....	4	27
.....	.....	1	1	1	1	.....	.....	1	.....	.....	.....	.....	.....	.....	2	3	28
.....	1	3	5	4	6	5	11	9	13	9	5	1	1	.....	45	29	29
.....	3	.....	1	.....	1	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	6	30
.....	1	3	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	31
1	1	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	32
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	26	24	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	2	1	1	3	34
4	3	11	2	3	1	4	1	1	.....	2	.....	1	.....	1	29	15	35
3	2	.....	2	.....	1	1	.....	1	.....	.....	.....	.....	.....	.....	7	4	36
5	3	5	12	8	10	13	12	9	12	8	10	3	.....	1	87	65	37
.....	.....	1	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	3	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence.										
			1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	1,036	35	40	17	21	17	71	25	33	38	23	32
	Rates per 1,000 population. 1912	17.51	13.49	16.17	13.29	18.72	16.06	22.54	20.81	12.11	16.31	10.77	13.10
	Rates per 1,000 population. 1911	18.72	13.86	20.20	18.10	16.24	13.26	12.44	27.22	11.86	19.93	16.11	14.00
1	Typhoid fever	2	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	13	1	.....	.....	.....	.....	6	.....	1	1	.....	.....
6	Scarlet fever	4	.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....
7	Whooping cough	10	1	2	1	.....	.....	.....	.....	.....	.....	.....	2
8	Diphtheria and croup	9	.....	1	.....	.....	.....	.....	.....	.....	.....	1	.....
9	Influenza	5	.....	.....	.....	.....	1	.....	.....	.....	.....	1	.....
12	Other epidemic diseases	6	1	.....	.....	.....	.....	1	.....	.....	.....	.....	1
13	Tuberculosis of the lungs	109	5	5	1	3	3	3	2	5	5	1	3
14	Tuberculous meningitis	10	1	1	.....	.....	.....	.....	.....	1	.....	.....	.....
15	Other forms of tuberculosis	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
16	Cancer, malignant tumor	64	3	3	1	.....	2	1	.....	2	.....	1	3
17	Simple meningitis (except cerebro-spinal meningitis).	7	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....
17a	Cerebro-spinal meningitis	4	.....	.....	.....	.....	.....	1	.....	2	.....	.....	.....
18	Apoplexy and softening of the brain.	61	1	1	1	4	2	1	2	1	.....	3	1
19	Organic heart diseases	153	9	8	3	1	2	6	2	6	7	3	10
20	Acute bronchitis	6	.....	.....	1	1	.....	2	.....	.....	.....	.....	.....
21	Chronic bronchitis	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	105	2	6	2	3	1	17	8	1	5	2	.....
22a	Broncho-pneumonia	52	2	1	.....	3	2	9	1	1	3	.....	.....
23	Other respiratory diseases	8	.....	.....	.....	1	.....	.....	.....	1	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	11	.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....
25	Diarrhea and enteritis (under two years).	23	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....
26	Appendicitis and typhlitis	9	1	1	.....	.....	.....	.....	.....	.....	.....	.....	1
27	Hernia, intestinal obstruction,	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
28	Cirrhosis of liver	5	.....	.....	1	.....	.....	1	.....	.....	1	.....	.....
29	Bright's disease and nephritis	74	1	3	2	.....	4	3	3	.....	5	2	2
30	Diseases of women (not cancer)	6	.....	.....	.....	.....	.....	.....	.....	.....	1	1	.....
31	Puerperal septicemia	5	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	4	1	.....	.....	.....	.....	1	.....	1	.....	.....	.....
33	Congenital debility and malformations.	50	1	.....	.....	1	.....	7	.....	2	2	.....	.....
34	Old age	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....
35	Violent deaths	44	2	1	1	.....	.....	3	.....	2	2	2	1
36	Suicide	11	.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....
37	Other diseases	152	2	6	2	2	.....	6	6	5	6	4	8
38	Ill defined causes	3	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....
	Total deaths under one year	158	5	4	1	2	.....	20	1	6	10	.....	2

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number.
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
35	32	30	32	38	37	35	44	84	39	33	33	48	40	24	....	96	4	
16.74	18.09	15.06	18.01	16.94	16.45	18.51	16.31	16.51	14.70	12.97	12.33	14.43	16.96	18.31	....	....	....	....
19.04	24.29	17.79	18.16	16.96	14.90	22.86	12.42	21.20	14.69	13.56	14.58	15.50	13.16	.....	....	....	....	....
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	....	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	....	4
.....	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	....	....	....	5
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	....	6
.....	.....	.....	.....	1	.....	.....	1	.....	.....	.....	1	.....	.....	1	....	....	....	7
.....	2	.....	.....	.....	1	.....	.....	2	.....	1	.....	.....	1	.....	....	....	....	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....	....	1	....	9
.....	.....	.....	1	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	....	1	....	12
4	8	1	5	5	5	8	8	1	4	1	1	2	5	1	....	13	1	13
.....	.....	2	.....	.....	.....	.....	.....	2	.....	.....	.....	.....	1	.....	....	2	....	14
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	....	....	....	15
.....	1	2	2	3	4	2	4	6	3	3	1	7	2	2	....	6	....	16
.....	.....	1	1	.....	1	.....	1	1	.....	.....	.....	.....	.....	.....	....	....	....	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	....	....	....	17a
.....	.....	2	4	3	3	1	2	7	6	.....	1	7	4	1	....	3	....	18
7	6	4	4	6	2	3	6	16	6	5	10	6	6	3	....	5	1	19
.....	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	....	....	....	20
.....	.....	1	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	....	....	21
6	3	1	2	7	7	4	3	3	2	6	1	5	1	2	....	5	....	22
2	2	2	.....	2	4	1	4	7	2	1	.....	3	.....	.....	....	....	....	22a
.....	1	2	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	2	.....	....	....	....	23
.....	1	.....	3	.....	.....	.....	1	2	1	.....	1	.....	.....	.....	....	....	....	24
.....	.....	3	.....	1	.....	.....	.....	12	.....	1	.....	1	1	1	....	2	....	25
.....	.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	1	.....	1	....	2	....	26
.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	2	....	27
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	....	28
3	.....	2	3	1	2	4	1	4	4	4	6	5	4	1	....	5	....	29
2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	....	1	....	30
.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	1	.....	.....	....	3	....	31
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	....	32
1	.....	1	.....	1	2	3	2	3	1	4	3	3	5	4	....	4	....	33
.....	1	1	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	....	....	....	34
3	3	1	2	1	.....	2	2	3	.....	2	.....	.....	1	1	....	9	....	35
.....	.....	.....	.....	.....	.....	.....	1	.....	2	.....	.....	.....	.....	.....	....	5	1	36
7	3	2	1	5	5	5	5	15	7	5	7	5	5	4	....	23	1	37
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	....	38
3	2	6	2	7	6	4	7	23	3	5	6	5	9	9	....	10	....	

VITAL STATISTICS.

April Infant Mortality.

Detailed List Class Number.	Causes of Death.	April Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	158	191	16	6	5	14	5	10	9	16	10	30	25	12	34	78	10
	Male	88	106	7	5	2	5	2	5	3	10	7	20	15	7	21	46	9
	Female	70	85	9	1	3	9	3	5	6	6	3	10	10	5	13	32	1
	White	154	184	16	5	5	14	5	10	8	16	10	29	24	12	34	75	10
	Colored	4	7	...	1	...	...	...	...	1	...	...	1	1	...	...	3	...
1	Typhoid fever	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
5	Smallpox	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
6	Measles	5	2	...	...	...	...	...	...	...	1	...	...	3	1	3	2	...
7	Scarlet fever	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
8	Whooping cough	5	4	...	...	...	...	...	...	...	...	...	2	3	...	1	4	...
9	Diphtheria and croup	1	3	...	...	...	...	...	...	...	...	...	...	1	...	1	...	...
10	Influenza	1	1	...	...	...	...	...	...	...	...	...	...	1	...	...	1	...
14	Dysentery	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
18	Erysipelas	2	1	...	...	...	...	...	...	...	1	1	...	...	...	1	1	...
19	Other epidemic diseases	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
20	Pus-infection and septicemia	1	...	...	...	...	...	...	...	...	...	...	1	...	...	...	1	...
24	Tetanus	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
28	Tuberculosis of the lungs	1	...	...	...	...	...	...	...	...	...	...	1	...	...	...	1	...
29	Acute miliary tuberculosis	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
30	Tuberculous meningitis	1	2	...	...	...	...	...	...	...	...	...	1	...	...	...	1	...
31 35	Other forms of tuberculosis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
36	Rickets	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
37	Syphilis	2	1	...	1	...	...	...	...	1	...	...	...	...	...	...	1	...
38	Gonococcus infection	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
61	Simple meningitis	3	4	...	...	...	...	...	...	...	1	...	...	1	1	1	2	...
61a	Cerebro-spinal fever	2	...	...	...	...	...	...	...	...	...	...	...	1	1	1	1	...
63a	Acute poliomyelitis	1	...	...	...	...	...	...	...	...	...	...	...	...	1	1	...	...
71	Convulsions	3	3	...	...	...	1	...	...	1	...	...	1	...	...	2	...	...
76	Diseases of the ears	1	3	...	...	...	...	...	...	...	...	...	...	1	...	...	1	1
79	Organic diseases of the heart	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
89	Acute bronchitis	1	5	...	...	...	...	...	...	...	...	...	...	1	...	...	1	...
91	Broncho-pneumonia	19	20	...	...	1	1	...	...	1	...	3	7	3	3	4	13	...
92	Pneumonia	13	19	...	...	...	1	...	...	...	2	...	4	3	3	8	4	...
93	Pleurisy	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
103	Other diseases of stomach	2	...	...	...	...	...	...	...	...	...	1	...	...	1	...	2	...

VITAL STATISTICS.

April Infant Mortality.— *Concluded.*

Detailed List Class Number.	Causes of Death.	April Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
104	Diarrhea and enteritis	21	46	...	...	...	...	1	...	5	4	1	7	3	...	3	17	2
108	Appendicitis and typhlitis	1	...	...	...	...	1	...	...	...	...	...	...	...	...	...	...	...
109	Hernias, intestinal obstruction,	...	3	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
117	Simple peritonitis	1	2	...	...	...	...	1	...	...	...	...	...	...	...	...	...	1
119	Acute nephritis	1	...	...	...	...	...	...	...	...	1	...	...	...	...	...	1	...
143	Furuncle	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
144	Acute abscess	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
145	Other diseases of skin, etc.	3	2	...	...	...	...	...	1	...	1	...	...	1	...	...	3	1
150*a*	Hydrocephalus	3	...	1	...	1	...	...	...	...	...	...	...	...	1	...	1	...
b	Congenital malformations of heart.	3	11	1	1	...	1	...	...	...	...	...	...	...	...	...	...	...
c	Other malformations	4	...	...	...	...	1	1	...	...	...	1	1	...	...	...	2	1
151*a*	Premature birth	28	...	9	4	1	4	1	5	1	2	1	...	...	...	2	7	2
b	Congenital debility	11	35	...	...	1	2	...	2	...	1	1	2	2	...	4	4	1
152*a*	Injuries at birth	5	...	4	...	1	...	...	...	...	...	...	...	...	...	...	...	...
b	Other causes peculiar to early infancy.	4	9	1	...	...	2	...	1	...	...	...	...	...	...	...	1	...
167	Burns (conflagrations excepted).	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
168	Absorption of deleterious gases,	2	...	...	...	...	...	...	...	...	1	...	1	...	...	2	...	...
172	Traumatism by fall	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
182 184	Homicide	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
187 189	Ill-defined diseases	1	2	...	...	...	...	...	...	...	...	...	...	1	...	...	1	...
	Other causes	6	10	...	...	...	...	1	1	...	2	...	2	...	...	...	5	1
	Breast fed *	34	38	...	...	...	...	...	3	3	4	2	9	6	7	34	...	...
	Bottle fed *	78	102	...	...	...	...	...	7	6	12	8	21	19	5	...	78	7
	Nonresidents	10	16	1	1	...	...	1	...	...	1	1	3	2	...	...	7	10

* Aged two weeks and over.

Additional Deaths for Other Months.

January, 1911.— 1 male; accidental drowning; white; 30 years; residence unknown; birthplace unknown; mother nativity, unknown.

February, 1911.— 1 male; tuberculosis; white; 26 years; residence Ward 20; born in United States; mother nativity, United States.

1 male; tuberculosis; white; 24 years; residence Ward 18; born in United States; mother nativity, Canada.

1 female; pneumonia; black; 45 years; residence Ward 18; birthplace unknown; mother nativity, unknown.

1 male; gas poisoning; white; 23 years; nonresident; born in Italy; mother nativity, Italy.

1 female; gas poisoning; white; 40 years; residence unknown; birthplace unknown; mother nativity, unknown.

1 male; accidental asphyxia; white; 1 day; residence Ward 14; born in United States; mother nativity, United States.

1 male; accidental drowning; white; 31 years; nonresident; born in United States; mother nativity, United States.

March, 1911.— 1 male; alcoholism; white; 70 years; nonresident; birthplace unknown; mother nativity, unknown.

1 male; alcoholism; black; 50 years; residence Ward 18; birthplace unknown; mother nativity, unknown.

1 male; accidental drowning; black; 47 years; residence Ward 18; born in United States; mother nativity, unknown.

MORBIDITY STATISTICS.

April, 1912. **Cases Reported.**

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum.
1	....	1	....	....	....	3	....	....	....	....	66	1	1
2	....	....	....	....	....	5	....	....	1	....	16	1	3
3	....	....	....	....	....	.....	....	....	....	....	9	2	1
4	....	....	....	....	....	.....	....	....	....	....	8	....	1
5	....	....	....	....	....	.....	....	....	....	....	11	....	....
6	....	1	....	....	1	10	....	....	....	....	98	....	11
7	....	....	....	....	....	3	....	....	....	....	8	1	6
8	....	....	....	....	2	12	....	....	....	....	18	....	12
9	....	....	....	....	....	.....	....	....	....	....	19	3	7
10	....	....	....	....	....	3	....	....	....	....	13	2	1
11	....	....	....	....	....	8	....	....	....	....	17	....	1
12	....	....	....	....	....	5	....	....	....	....	80	....	2
13	....	....	....	....	....	5	....	....	....	....	51	2	4
14	....	....	....	....	1	4	....	....	....	....	35	....	....
15	....	....	....	....	....	2	....	....	....	....	30	2	3
16	....	....	....	....	....	6	....	....	....	....	26	1	3
17	....	....	....	....	....	4	....	....	....	....	6	1	3
18	....	....	....	....	....	1	....	....	....	....	25	....	....
19	....	....	....	....	1	6	....	....	....	....	1	4	....
20	....	....	....	....	....	21	....	....	....	....	28	4	7
21	....	....	....	....	....	9	....	....	....	....	37	3	3
22	....	....	....	....	....	5	....	....	1	....	20	1	3
23	....	....	....	....	....	.....	....	....	....	....	6	....	....
24	....	....	....	....	....	1	....	....	....	....	13	....	2
25	....	....	....	....	....	2	....	....	....	....	49	1	....
26	....	....	....	....	1	.....	....	....	....	....	22	....	....
Total	....	2	....	....	6	115	....	....	2	....	712	29	74
Unknown	....	....	....	....	....	.....	....	....	....	....	.....	....	....
Nonresidents	....	....	....	....	....	3	....	....	....	....	10	....	4
Grand total	....	2	....	....	6	118	....	....	2	....	722	29	78
Corresponding month last year.	....	....	....	....	4	182	....	....	1	....	698	53	90

MORBIDITY STATISTICS.

Cases Reported. **April, 1912.**

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
9	....	....	....	....	14	2	....	....	6	5	....	1
6	....	....	....	....	18	1	3	....	13	5	....	2
2	....	....	....	....	6	....	....	....	1	.....	....	3
11	....	....	....	....	15	....	....	....	1	2	....	4
.....	....	....	....	....	5	1	....	....	.....	3	....	5
3	....	....	....	....	36	2	3	....	11	4	....	6
1	....	....	....	....	21	3	1	....	14	1	....	7
4	....	....	....	....	34	5	2	....	6	6	....	8
3	....	....	....	....	20	1	2	....	9	5	....	9
2	....	....	....	....	14	....	....	....	2	1	....	10
1	....	....	....	....	4	....	....	....	2	3	....	11
2	....	....	....	....	15	2	....	....	2	1	....	12
3	....	....	....	....	12	....	....	....	4	.....	....	13
5	....	....	....	....	4	4	....	....	2	3	....	14
8	....	....	....	....	17	....	1	....	13	.....	....	15
.....	....	....	....	....	9	....	....	....	10	2	....	16
.....	....	....	....	....	16	....	1	....	3	1	....	17
1	....	....	....	....	16	....	....	....	5	2	....	18
4	....	....	....	....	22	....	....	....	16	1	....	19
8	....	....	....	....	18	1	3	....	14	6	....	20
7	....	....	....	....	15	....	....	....	7	3	....	21
6	....	....	....	....	16	....	2	....	4	1	....	22
1	....	....	....	....	4	....	....	....	1	11	....	23
6	....	....	....	....	16	1	1	....	6	14	....	24
5	....	....	....	....	6	1	....	....	7	1	....	25
1	....	....	....	....	2	....	....	....	3	2	....	26
99	....	....	....	....	375	24	19	....	262	83	....	Total
.....	....	....	....	....	1	....	....	....	.....	.....	....	Unknown
10	....	....	2	....	15	6	....	....	.....	.....	....	Nonresidents
109	....	....	2	....	391	30	19	....	262	83	....	Grand total
149	....	4	.....	....	304	....	22	....	77	144	....	Corresponding month last year.

DIVISION OF CHILD HYGIENE.

1. Medical Inspection of Schools.

Number inspections made	17,957
Number physical examinations made	4,361

There were 1,588 children excluded from school during the month, ill with contagious disease, as follows:

Scarlet fever	3	Pediculosis	950
Measles	12	Acute or purulent conjunctivitis	61
German measles	9	Scabies	24
Chicken pox	38	Impetigo	59
Whooping cough	7	Favus	2
Mumps	4	Ringworm	32
Pulmonary tuberculosis	3	Miscellaneous	308
Acute tonsilitis	68		
Influenza	8		

There were 14,256 cases of noncontagious disease found, subdivided as follows:

Diseases of oral and respiratory tract	2,955
Diseases of eye	560
Diseases of ear	117
Diseases of skin	1,044
Dental caries	2,713
Miscellaneous	6,867

2. Physical Examination of Licensed Minors.

There were 314 children between the ages of 14 and 16 examined during this month. 145 were found without defects and 169 with defects as follows:

Sight	42	Heart	3
Throat	29	Skin	1
Mouth and lips	114	Miscellaneous	3

3. Pre-Natal and Post-Natal Work.

Pre-Natal.

Cases	16	Babies born	62
Visits	84	Deaths, babies	10

The following defective conditions were noted:

Œdema	1	Varicose veins	3

Mothers attended as follows:

Family doctor	10	Midwife	32
Hospital attendance	20		

Post-Natal.

Cases	147	Bottle-fed babies	8
Visits	470	Both feedings	40
Breast-fed babies	378		

Defective Conditions Noted.

Cervical abscess	5	Otitis media	3
Improper feeding	9	Skin disease	7
Ophthalmia	4	Umbilical hernia	3
Orthopedic defects	4		

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:		
Positive for diagnosis	78	
Positive for release	32	
Negative for diagnosis	871	
Negative for release	128	
"No growth" cultures	10—	1,119
TUBERCULOSIS:		
Positive	124	
Negative	455	
Unsatisfactory	0—	579
TYPHOID:		
Positive	8	
Negative	107	
Atypical	3—	118

GLANDERS:	Strauss.	C.	F.	Ag.	
Positive	0	11	12	23	
Negative	3	22	18	43	
Unsatisfactory	1	0	0	1	
Atypical	0	3	6	9	— 76

GONORRHEA:		
Positive	28	
Negative	108	
Unsatisfactory	0—	136
GONORRHOEAL OPHTHALMIA:		
Positive	1	
Negative	49	
Unsatisfactory	1—	51
OTHER EXAMINATIONS:		
*Positive	8	
Negative	35	
Unsatisfactory	1—	44
BACTERIOLOGICAL MILK EXAMINATIONS	688	688
Cultures for streptococci	585	585
Total	3,396	3,396

SPECIAL WORK:
Longevity of tubercle bacilli in sputum.
Cultural tests of streptococci.

* K-L Vir. organisms, typhoid urine and feces, malaria, G-U. T. B., Tr. Pallida.

INSPECTION OF MILK, VINEGAR, ETC.
Examination as to Statute Requirements.

Samples examined, milk from stores	489
" " milk from wagons	639
" " milk brought in by citizens	41
" " milk for bacteriological examination	688
" " vinegar	45
" " butter and cheese	263
Total samples	2,165

INSPECTION OF DAIRIES.

Satisfactory * on first inspection	160	
Satisfactory on later inspection	561	
	—	721
Unsatisfactory on first inspection	85	
Unsatisfactory on later inspection	26	
	—	111
Total number of inspections		832
Dairies having milk rooms	357	
Dairies without milk rooms	475	
Number of cattle inspected	8,257	
Number of dairies prohibited shipping milk to Boston because of insanitary conditions of premises	21	

* "Satisfactory" means having a score of at least 45 per cent by the government score card.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	348	Cattle condemned (4 and parts)	2,804 lbs.
Calves inspected	1,095	Calves condemned (9)	345 lbs.
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	5,084	Swine condemned (9 and parts)	3,619 lbs.

INSPECTION OF PROVISIONS.—ARTICLES CONDEMNED.

Meats.

Veal (immature)	227 lbs.
Veal (tainted)	100 lbs.
Veal (unstamped)	83 lbs.
Mutton (tainted)	19 lbs.
Beef (tainted)	2,753 lbs.
Pork (tainted)	43 lbs.
Poultry (tainted)	47 lbs.

Miscellaneous.

Fish (tainted)	200 lbs.
Fruit (decayed)	1½ bush.
Potatoes (decayed)	826 bush.
Vegetables (decayed)	1½ bush.

SANITARY INSPECTION DIVISION.

New reports	2,062
Reinspections	6,771
New tenement house reports	97
Nuisances reported	4,644
Legal notices	558
Court cases	9
Fines	$85
Tenements vacated	1
Milk applications approved	1,408
Houses demolished	2
Stable permits granted	2
Stable hearings	2
Dump permits	10

QUARANTINE.

Vessels inspected at quarantine	71
Total immigrants arriving in Boston	7,608

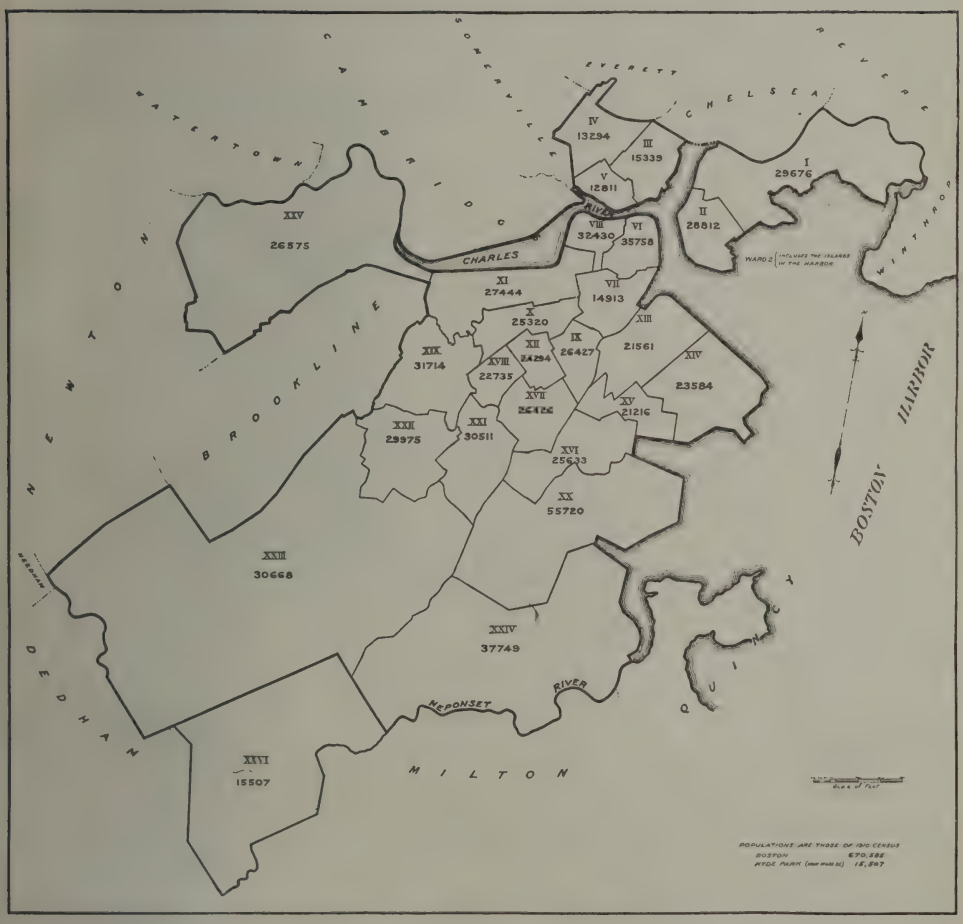
MONTHLY METEOROLOGICAL SUMMARY.

Taken at Weather Bureau, Boston, April, 1912.

Day.	Temperature, Degrees Fahrenheit.			Relative Humidity.	Daily Precipitation.	Actual Hours Sunshine.	Wind.		
	Maximum.	Minimum.	Mean.				Average Hourly Velocity. (Miles.)	Maximum Velocity. (Miles.)	Prevailing Direction.
1.....	52	36	44	64	.01	10.9	12.5	27	N.
2.....	39	36	38	98	.67	—	11.8	24	N. E.
3.....	45	29	37	71	.04	8.1	18.0	33	N. W.
4.....	44	27	36	38	—	12.8	14.1	25	N. W.
5.....	69	35	52	72	.08	7.2	11.4	30	S. W.
6.....	71	39	55	66	—	11.1	7.0	15	E.
7.....	72	36	54	93	.37	7.5	12.0	33	E.
8.....	38	30	34	68	.04	8.4	19.0	30	W.
9.....	40	28	34	71	.05	8.1	11.6	22	W.
10.....	46	34	40	63	—	9.3	8.0	14	N.
11.....	54	35	44	51	—	9.9	11.4	22	W.
12	59	38	48	61	.04	9.1	7.9	17	N. W.
13.....	49	41	45	82	—	10.4	7.0	14	E.
14.....	41	40	40	100	.19	—	11.4	19	E.
15.....	56	40	48	96	.01	5.5	6.0	13	E.
16.....	77	56	66	82	.08	8.2	12.0	23	S. W.
17.....	61	46	54	74	.21	6.7	8.0	13	S. E.
18.....	47	38	42	98	.40	—	16.0	31	N. E.
19.....	51	37	44	82	.11	1.8	11.5	24	W.
20.....	60	41	50	44	—	13.6	10.2	18	N. W.
21.....	72	42	57	47	—	13.6	9.3	19	W.
22.....	63	43	53	92	.24	0.3	10.4	24	S.
23.....	55	43	49	70	.06	6.0	18.2	37	W.
24.....	59	40	50	64	.03	10.2	12.3	24	W.
25.....	62	44	53	44	—	13.8	10.3	21	N. W.
26.....	67	47	57	42	—	12.4	11.0	26	S. W.
27.....	65	52	58	90	.10	3.2	17.2	27	S. W.
28.....	56	38	47	34	—	13.9	17.3	31	N. W.
29.....	51	38	44	78	.34	4.2	7.0	15	N. W.
30.....	50	37	44	71	—	8.1	7.8	18	E.
Totals.....	1,671	1,166	1,417	2,106	3.07	234.3	347.6	37	—
Means.....	55.7	38.9	47.2	70.2	0.10	78.1	11.6	—	W.

Latitude 42 degrees 21 minutes. Longitude 71 degrees 4 minutes.

BOSTON WARD MAP.



Vol. 1 MAY, 1912 No. 5

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF THE

CITY OF BOSTON

PAGE

The Relation of the Foreign Population to the Mortality Rates of Boston 103

Vital Statistics, May, 1912 132

Monthly reports 144

CITY OF BOSTON
PRINTING DEPARTMENT
1912

ORGANIZATION OF THE HEALTH DEPARTMENT.

SAMUEL H. DURGIN, M. D., *Chairman.*
FRANCIS X. MAHONEY, M. D.
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

ALLIED PRINTING TRADES LABOR UNION COUNCIL TRENTON, N.J.

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, MAY, 1912. NO. 5.

THE RELATION OF THE FOREIGN POPULATION TO THE MORTALITY RATES OF BOSTON.*

BY WILLIAM H. DAVIS, M. D.
Vital Statistician, Boston Health Department.

"Foreign Population" is an elastic expression which will be used in this paper to designate that part of the white population having foreign-born mothers.

Only in this Western Hemisphere are people from so many countries to be found dwelling together in the same climate, in the same city, and often in the same block.

What an opportunity, therefore, to study the various peoples to determine which are battling against great odds as indicated by excessive mortality and morbidity rates, and how possibly such rates may be reduced.

According to the 1900 census, 98 per cent of Boston's population were white, 30 per cent having mothers born in the United States, 31 per cent mothers born in Ireland, 13 per cent mothers born in Canada, and 23 per cent mothers born in other foreign countries.

Table I. gives for 1900 the census populations, deaths and death rates by color, by sex, by age and of whites by birthplaces of mothers.

A few of the rates based upon very small numbers are not of great value.

Deaths of nonresidents have been deducted in all calculations given in this paper, and deaths under the heading Birthplaces of Mothers Unknown have not been distributed, so that all rates given are doubtless somewhat too low for all nationalities.

Many of the rates are very startling.

Under five years of age those of Italian mothers had for males a mortality rate of 108 per thousand and for females a

* Read at annual meeting of American Academy of Medicine, Atlantic City, May 31 to June 2, 1912.

rate of 79, while those of mothers born in Germany had corresponding rates of 37 and 34.

Again, take the age period thirty to thirty-five years, the rates for those having mothers born in Ireland were 14 per thousand males and 12 per thousand females,— a rate for males 7 times that of the Russians, $3\frac{1}{2}$ times that of the Italians or Scandinavians, and more than twice that of the English, Scotch or natives, and a rate for females twice that of the Scandinavians, Scotch, Italians or Russians, and 3 times that of the natives.

If, now, the rates of those having mothers born in the United States be taken as a standard and the rates for each age period and for each sex be applied to the corresponding population of those having mothers born in Ireland, a theoretical number of deaths is obtained. It is thus found that instead of the 3,967 actual deaths among those whose mothers were born in Ireland, there would have been but 2,400. The difference between these numbers represents the number of excess deaths and measures the influence of the Irish population in raising Boston's rate in 1900.

Using the same standard rates, the general death rate of the city would have been 14.65 instead of the actual rate 19.40; that is to say, the 1,567 excess Irish deaths raised Boston's rate 2.79 or from 14.65 to 17.44.

Found in the same way, the other amounts which the foreign population raised Boston's rate were as follows: Canadians, .26; Italians, .25; Scotch, .04; Germans, .01, and other foreign, .01; making a total of 3.36.

The amounts which the foreign population lowered the rate were Russians and Poles, .14; Scandinavians, .06; and English and Welsh, .02; a total of .22. The net effect of the foreign population was, therefore, to raise Boston's rate 3.14 per 1,000. The balance of the raise was due partly to the colored population, which raised the rate .37, and partly to those having mothers whose birthplaces were unknown, who raised the rate 1.23.

(See Table VI.)

The rates for the various age periods are shown approximately in the two charts following Table I., the inverted v in each column showing the city's rate.

Those of Irish mothers were, therefore, the principal factor. Per 10,000 of their population they raised the city's rate .16, while the Italians per 10,000 of their population raised it .12, and the Canadians but .04.

The influence of the foreign population may be made clear

in another way, namely, by applying the rates of each age period of each mother nativity for each sex to the corresponding division of the aggregate population.

In this way it has been found that if all of Boston's population had had mothers born in the United States the rate of the city would have been 14.65; if all had had mothers born in Ireland the rate would have been 23.09; and had all been Italians the rate would have been 20.43; if all Canadians the rate 16.30; if all Russians and Poles, the rate 15.71; if all Germans, the rate 14.24; if all English and Welsh, the rate 13.67; and if all Scandinavians, the rate 11.62.

If one scans the rates in Table I. it is seen that in all the age periods between 15 and 70 years, both male and female, the rates of those having mothers born in Ireland were double the rates of those having mothers born in the United States.

But why such high rates among the Irish? What was the cause of this excessive mortality? Using the rates of those having mothers born in the United States as the standard, it is found for the males that 35 per cent of the excess deaths were due to pulmonary tuberculosis. In the age period 15–19, 76 per cent of the excess deaths were due to this cause, and in the successive age periods up to seventy years the percentages of excess deaths due to pulmonary tuberculosis were respectively, 56, 47, 47, 45, 31, 29, 19, 7, 18 and 13.

Other diseases important in accounting for the excess deaths were pneumonia, heart disease, nephritis, cancer, apoplexy, and alcoholism — alcoholism especially interesting as a cause of death, because of the possibliity of some day eliminating it as an important factor in mortality rates. Though deaths credited to alcoholism never tell the whole story, for many deaths assigned to pneumonia, apoplexy, œdema of the brain, diarrhœa and enteritis, nephritis, and cirrhosis are undoubtedly due indirectly to alcohol. In 1900 of sixty-eight deaths from alcoholism forty-four had mothers born in Ireland.

Among the females also pulmonary tuberculosis was a most important factor, causing 27 per cent of the excess deaths.

The causes of these excess deaths are given in more detail in Tables VII. and VIII.

This high mortality among those of mothers born in Ireland was not confined in 1900 to Boston, for the Twelfth Census shows that for the whole registration area — containing then over twenty million people, for all ages above fifteen years, the general death rates of those having mothers born in Ireland were higher than the rates of any other division of the white population.

So also in the registration area the death rates from pulmonary tuberculosis and alcoholism in white persons over fifteen years of age were highest for those whose mothers were born in Ireland.

But for Ireland itself such very high rates were not found. The death rate for all Ireland in 1900 was 19.65, while had the Boston rates of those having mothers born in Ireland prevailed in Ireland its rate would have been 33 per cent higher or 26.25 per 1,000 population. Likewise for pulmonary tuberculosis, Ireland's rate would have been raised 45 per cent or from 22.60 to 32.78 per 10,000 population. But for cancer Ireland's rate would have remained practically unchanged, the actual rate being 6.09 and the theoretical rate 6.07 per 10,000. For alcoholism Ireland's rate was 4.06 per 100,000, and Boston's Irish rate 25.19.

For Dublin in 1900 the actual general mortality rate was 25.6, a rate slightly lower than the theoretical rate just given for all Ireland, while the actual rate for pulmonary tuberculosis in Dublin was 34.31 per 10,000, a rate slightly higher than the theoretical rate just given for all Ireland.

The reasons for such high rates among the Irish in this country are not fully known, though the severe winters and the excessive use of alcohol are undoubtedly important factors.

Those of Italian mother nativity also had very high rates, especially for children under five years, due principally to pneumonia, broncho-pneumonia and measles. In the registration area also, pneumonia and measles at all age periods had their highest rates among those of Italian mothers.

Cancer, on the other hand, had remarkably low rates among the Italians in Boston, and in the registration area the Italians had the lowest cancer rates. Again, it is well known that Italy has very low cancer rates, though just across the Alps in Switzerland cancer rates are high.

In contrast to the high rates already considered stand out the low rates of the Scandinavians and Russians.

The Scandinavians had the lowest rates from heart disease and nephritis, while the Russians and Poles had the lowest rates from pulmonary tuberculosis. Both of these divisions of the population had low rates from pneumonia, broncho-pneumonia and cancer, and it should be noted that in Boston in 1900 not a death from alcoholism was credited to these divisions of the population.

This enviable record held for the most part in the registration area where the Russians and Poles had the lowest rates from

pulmonary tuberculosis, heart disease and nephritis, and were second only to the Italians in cancer and alcoholism, and where the Scandinavian cancer rate was next to the low rates of the Italians, Russians and Poles, and the Scandinavian rate for heart disease and nephritis was second only to that of the Russians and Poles.

The Germans in Boston also had low rates in 1900, and not a death from alcoholism.

Other differences in the 1900 rates for these various divisions of Boston's population are shown in the rate tables for tuberculosis, pneumonia, heart disease, nephritis and cancer.

(See Tables II.–V.)

So much for the year 1900.

Since that time immigration to the United States has continued unabated, 545,000 landing in Boston alone, and over 80,000 of these from Ireland. So that it seems probable that this division of the people in 1910 still maintained its 31 per cent of the city's population. If such be the case a marked improvement is seen in the Irish influence upon the general mortality rate in 1910; for in 1900, 36.5 per cent of all deaths were of those having mothers born in Ireland as against 32.8 per cent in 1910.

In 1910 pulmonary tuberculosis caused 1,081 deaths in Boston against 1,345 in 1900, a decrease of 20 per cent and corresponding to a decline in the mortality rate of this disease from twenty-five to seventeen per 10,000.

Deaths from pulmonary tuberculosis among those having mothers born in Ireland in the same decade fell from 653 to 490, a decrease of 25 per cent, a most excellent showing, though even in 1910 the 490 deaths represent 45 per cent of all the deaths from pulmonary tuberculosis, indicating that the Irish are still unduly handicapped by this disease.

Alcoholism also continues as another handicap, for of the 128 deaths from this cause in 1910, sixty had mothers born in Ireland.

(Other comparisons will be found in Table IX.)

May not comparative statistics of these various divisions of the foreign population in various parts of the world lead to many suggestions towards lowering the mortality rates?

The real effect of the foreign population upon our mortality rates will be better appreciated, the diseases most dangerous to certain races will be better known, and the wise individual of each nationality will safeguard himself and his family against the diseases peculiarly dangerous to him and his.

Table 1.—1900 Census Population, Deaths (Non-Residents Deducted), and Death Rates by Color, by Sex, by Age and of Whites by Birthplaces of Mothers.

Mother Nativity.	Sex.		All Ages.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.
Aggregate.....	.....	P.	560,892	12,473	11,006	11,557	11,406	10,919	57,361	48,896	42,362
		D.	10,880	2,339	589	330	230	164	3,652	328	123
		D. R.	19.40	187.53	53.52	28.55	20.16	15.02	63.67	6.71	2.90
Aggregate.....	Males	P.	274,922	6,215	5,574	5,761	5,664	5,414	28,628	24,495	21,202
		D.	5,533	1,309	330	160	131	78	2,008	161	55
		D. R.	20.13	210.62	59.20	27.77	23.13	14.41	70.14	6.57	2.59
	Females	P.	285,970	6,258	5,432	5,796	5,742	5,505	28,733	24,401	21,160
		D.	5,347	1,030	259	170	99	86	1,644	167	68
		D. R.	18.70	164.59	47.68	29.33	17.24	15.62	57.22	6.84	3.21
Whites.											
Aggregate.....	.....	P.	548,083	12,260	10,835	11,354	11,237	10,729	56,415	48,185	41,764
		D.	10,519	2,267	563	320	224	157	3,531	321	115
		D. R.	19.19	184,91	51.96	28.18	19.93	14.63	62.59	6.66	2.75
Aggregate.....	Males	P.	267,822	6,124	5,494	5,665	5,583	5,324	28,190	24,180	20,927
		D.	5,335	1,273	317	153	128	75	1,946	158	52
		D. R.	19.92	207.87	57.70	27.01	22.93	14.09	69.03	6.53	2.48
	Females	P.	280,261	6,136	5,341	5,689	5,654	5,405	28,225	24,005	20,837
		D.	5,184	994	246	167	96	82	1,585	163	63
		D. R.	18.50	161.99	46.06	29.35	16.98	15.17	56.16	6.79	3.02
Mothers born in United States,	Males	P.	83,512	2,075	1,892	1,950	1,881	1,792	9,590	8,286	7,333
		D.	1,428	458	84	46	34	26	648	47	17
		D. R.	17.10	220.72	44.40	23.59	18.08	14.51	67.57	5.67	2.32
	Females	P.	85,571	2,017	1,892	1,983	1,980	1,864	9,736	8,222	7,257
		D.	1,407	358	69	46	25	26	524	54	17
		D. R.	16.44	177.49	36.47	23.20	12.63	13.95	53.82	6.57	2.34
Mothers born in Ireland.....	Males	P.	82,409	1,597	1,403	1,484	1,414	1,417	7,315	6,109	5,154
		D.	1,950	354	85	38	34	23	534	36	13
		D.R.	23.66	221.67	60.58	25.61	24.05	16.23	73.00	5.89	2.52
	Females	P.	92,296	1,596	1,353	1,417	1,441	1,360	7,167	6,140	5,244
		D.	2,019	259	74	53	31	19	436	44	19
		D. R.	21.88	162.28	54.69	37.40	21.51	13.97	60.83	7.17	3.62
Mothers born in Germany.....	Males	P.	12,202	195	195	161	188	206	945	985	940
		D.	172	25	4	3	3	.....	35	10	2
		D. R.	14.10	128.21	20.51	18.63	15.96	.....	37.04	10.15	2.13
	Females	P.	11,702	171	169	192	170	191	893	957	905
		D.	154	14	6	3	5	2	30	8	2
		D. R.	13.16	81.87	35.50	15.63	29.41	10.47	33.59	8.36	2.21
Mothers born in England and Wales.....	Males	P.	11,936	201	193	172	190	200	956	954	887
		D.	174	30	6	4	5	4	49	9	2
		D. R.	14.58	149.25	31.09	23.26	26.32	20.00	51.26	9.43	2.25
	Females	P.	11,912	194	172	186	203	212	967	952	869
		D.	144	16	5	8	2	1	32	5	4
		D. R.	12.09	82.47	29.07	43.01	9.85	4.72	33.09	5.25	4.60
Mothers born in Canada.....	Males	P.	31,718	813	735	765	767	695	3,775	3,282	2,803
		D.	535	167	38	21	23	9	258	33	9
		D.R.	16.87	205.41	51.70	27.45	29.99	12.95	68.34	10.05	3.21
	Females	P.	38,811	840	732	735	754	734	3,795	3,250	2,990
		D.	529	141	28	24	8	17	218	23	11
		D. R.	13.63	167.86	38.25	32.65	10.61	23.16	57.44	7.08	3.68
Mothers born in Scandinavia..	Males	P.	5,430	149	144	135	136	119	683	513	386
		D.	54	21	2	3	4	3	33	.....	1
		D. R.	9.94	140.94	13.89	22.22	29.41	25.21	48.32	.....	2.59
	Females	P.	5,411	154	126	138	129	125	672	522	354
		D.	63	18	2	2	3	2	27	3	1
		D. R.	11.64	116.88	15.87	14.49	23.26	16.00	40.18	5.75	2.82

Table 1.—1900 Census Population, Deaths (Non-Residents Deducted), and Death Rates by Color, by Sex, by Age and of Whites by Birthplaces of Mothers.—*Continued.*

Mother Nativity.	Sex.		All Ages.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.
Mothers born in Scotland.....	Males	P.	5,069	59	76	69	67	63	334	304	290
		D.	79	13	1	1	4	2	21	3	.....
		D. R.	15.58	219.83	13.16	14.49	59.70	31.75	62.87	9.87	.....
	Females	P.	5,518	63	55	67	63	75	323	322	336
		D.	85	7	1	2	1	3	14	1	1
		D. R.	15.40	111.11	18.18	29.85	15.87	40.00	43.34	3.11	2.98
Mothers born in Italy.....	Males	P.	11,603	400	319	337	299	257	1,612	1,225	954
		D.	285	93	52	16	9	4	174	10	1
		D. R.	24.56	232.50	163.01	47.48	30.10	15.56	107.94	8.16	1.05
	Females	P.	8,678	443	319	346	310	257	1,675	1,138	858
		D.	199	72	35	12	9	5	133	14	3
		D. R.	22.92	162.53	109.72	34.68	29.03	19.46	79.40	12.30	3.50
Mothers born in France.....	Males	P.	1,000	11	13	9	15	9	57	49	46
		D.	14	4	.....	1	.....	.....	5	1	1
		D. R.	14.00	363.64	.....	111.11	.....	.....	87.72	20.40	21.74
	Females	P.	936	11	5	11	5	7	39	47	50
		D.	10	1	.....	.....	.....	.....	1	.....	.....
		D. R.	10.68	90.91	.....	.....	.....	.....	25.64	.....	.....
Mothers born in Russia and Poland.....	Males	P.	15,224	498	415	478	501	467	2,359	1,961	1,660
		D.	182	52	28	17	9	4	110	6	3
		D. R.	11.95	104.42	67.47	35.56	17.96	8.57	46.63	3.06	1.81
	Females	P.	13,887	514	408	501	479	479	2,381	1,959	1,579
		D.	181	69	17	9	7	5	107	8	3
		D. R.	13.03	134.24	41.67	17.96	14.61	10.44	44.94	4.08	1.90
Mothers born in other countries.....	Males	P.	5,126	111	101	92	102	86	492	434	404
		D.	70	23	10	2	2	.....	37	1	1
		D. R.	13.66	207.21	99.01	21.74	19.61	.....	75.20	2.30	2.48
	Females	P.	4,214	122	93	94	105	89	503	427	343
		D.	70	20	5	3	3	2	33	3	.....
		D. R.	16.61	163.93	53.76	31.91	28.57	22.47	65.61	7.03	.....
Nativity unknown.....	Males	P.	2,593	15	8	13	23	13	72	78	70
		D.	392	33	7	1	1	.....	42	2	2
		D. R.	.....	.....	.....	.....	.....	.....	.....	.....	.....
	Females	P.	1,325	11	17	19	15	12	74	69	52
		D.	323	19	4	5	2	.....	30	.....	2
		D. R.	.....	.....	.....	.....	.....	.....	.....	.....	.....
Colored.....	Males	P.	7,100	91	80	96	81	90	438	315	275
		D.	198	36	14	7	3	3	63	3	3
		D. R.	27.89	395.60	175.00	72.92	37.04	33.33	143.84	9.52	10.91
	Females	P.	5,709	122	91	107	88	100	508	396	323
		D.	163	36	13	3	3	4	59	4	5
		D. R.	28.55	295.08	142.96	28.04	34.09	40.00	116.14	10.10	15.48

Table 1.—1900 Census Population, Deaths (Non-Residents Deducted), and Death Rates by Color, by Sex, by Age and of Whites by Birthplaces of Mothers.—*Continued.*

Mother Nativity.	Sex.		15 to 19 Years.	20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.
Aggregate.....	.....	P.	42,254	57,860	64,882	55,722	48,547	36,918	28,403	24,323	16,687
		D.	224	409	594	519	553	477	449	521	533
		D. R.	5.30	7.07	9.16	9.31	11.39	12.92	15.81	21.42	31.94
Aggregate.....	Males	P.	19,965	26,199	31,759	28,603	24,862	18,886	13,981	11,929	7,977
		D.	117	210	302	280	307	249	242	269	276
		D. R.	5.86	8.02	9.51	9.79	12.35	13.18	17.31	22.55	34.60
	Females	P.	22,289	31,661	33,123	27,119	23,685	18,032	14,422	12,394	8,710
		D.	107	199	292	239	246	228	207	252	257
		D. R.	4.80	6.29	8.82	8.81	10.39	12.64	14.35	20.33	29.51
Whites.											
Aggregate.....	.....	P.	41,488	56,306	62,904	54,039	47,100	35,935	27,628	23,761	16,428
		D.	216	392	562	497	528	450	426	500	519
		D. R.	5.21	6.96	8.93	9.20	11.21	12.52	15.42	21.04	31.59
Aggregate.....	Males	P.	19,593	25,399	30,654	27,567	23,958	18,262	13,514	11,586	7,839
		D.	115	201	283	268	289	237	225	254	265
		D. R.	5.87	7.95	9.23	9.72	12.06	12.98	16.65	21.92	33.81
	Females	P.	21,895	30,907	32,250	26,472	23,142	17,673	14,114	12,175	8,589
		D.	101	191	279	229	239	213	201	246	254
		D. R.	4.61	6.18	8.65	8.65	10.33	12.05	14.24	20.21	29.57
Mothers born in United States,	Males	P.	6,750	8,149	8,568	6,899	5,716	5,092	4,232	3,936	2,900
		D.	26	37	45	39	38	33	52	60	64
		D. R.	3.85	4.54	5.25	5.65	6.65	6.48	12.29	15.24	22.07
	Females	P.	7,133	8,288	7,983	6,358	5,505	5,026	4,508	4,149	3,198
		D.	27	36	46	26	29	33	45	50	59
		D. R.	3.79	4.34	5.76	4.09	5.27	6.57	9.98	12.05	18.45
Mothers born in Ireland.....	Males	P.	5,091	7,700	10,357	9,753	8,813	6,383	4,601	3,886	2,511
		D.	37	91	139	141	151	124	92	112	119
		D. R.	7.27	11.82	13.42	14.46	17.13	19.43	20.00	28.82	47.39
	Females	P.	6,012	10,572	12,326	10,072	8,969	6,438	5,099	4,464	2,979
		D.	37	80	124	118	129	101	86	125	119
		D. R.	6.15	7.57	10.06	11.72	14.38	15.69	16.87	28.00	39.95
Mothers born in Germany.....	Males	P.	910	1,041	1,165	1,314	1,229	1,067	689	632	455
		D.	1	7	14	11	7	7	8	11	10
		D. R.	1.10	6.72	12.02	8.37	5.70	6.56	11.61	17.41	21.98
	Females	P.	956	1,189	1,249	1,237	1,075	875	623	516	370
		D.	5	5	8	11	8	10	12	4	11
		D. R.	5.23	4.21	6.41	8.89	7.44	11.43	19.26	7.75	29.73
Mothers born in England and Wales.....	Males	P.	855	929	1,259	1,323	1,181	928	756	687	458
		D.	3	5	8	7	9	11	5	10	9
		D. R.	3.51	5.38	6.35	5.29	7.62	11.85	6.61	14.56	19.65
	Females	P.	841	1,159	1,282	1,142	1,199	910	688	613	441
		D.	4	5	6	10	3	9	6	13	4
		D. R.	4.76	4.31	4.68	8.76	2.50	9.89	8.72	21.21	9.07
Mothers born in Canada.....	Males	P.	2,657	3,545	4,144	3,419	2,860	1,760	1,158	872	562
		D.	22	34	31	33	27	19	15	12	10
		D. R.	8.28	9.59	7.48	9.65	9.44	10.80	12.95	13.76	17.79
	Females	P.	3,359	5,451	5,272	4,092	3,389	2,190	1,602	1,221	822
		D.	14	39	40	29	32	20	17	17	12
		D. R.	4.17	7.15	7.59	7.09	9.44	9.13	10.61	13.92	14.60
Mothers born in Scandinavia...	Males	P.	314	410	644	746	615	416	237	196	115
		D.	.....	.....	4	3	5	1	1	1	1
		D. R.	.....	.....	6.21	4.02	8.13	2.40	4.22	5.10	8.70
	Females	P.	362	674	763	645	500	344	199	125	92
		D.	1	3	9	3	3	3	.....	.....	.....
		D. R.	2.76	4.45	11.80	4.65	6.00	8.72	.....	.....	.....

Table 1.— 1900 Census Population, Deaths (Non-Residents Deducted), and Death Rates by Color, by Sex, by Age and of Whites by Birthplaces of Mothers.— *Continued.*

Mother Nativity.	Sex.		15 to 19 Years.	20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.
Mothers born in Scotland.....	Males	P.	275	349	512	647	577	439	390	349	237
		D.	1	3	4	3	6	4	3	3	4
		D. R.	3.64	8.60	7.81	4.64	10.40	9.11	7.69	8.60	16.88
	Females	P.	333	509	627	596	609	467	378	330	221
		D.	1	2	5	3	2	4	5	4	5
		D. R.	3.00	3.93	7.97	5.03	3.28	8.57	13.23	12.12	22.62
Mothers born in Italy.....	Males	P.	857	1,086	1,374	1,338	1,011	833	504	371	181
		D.	11	11	15	6	10	8	10	5	7
		D. R.	12.84	10.13	10.92	4.48	9.89	9.60	19.84	13.48	38.67
	Females	P.	729	851	832	711	557	469	291	222	138
		D.	2	1	12	4	6	6	3	5	4
		D. R.	2.74	1.18	14.42	5.63	10.77	12.79	10.31	22.52	28.99
Mothers born in France.....	Males	P.	46	88	117	131	96	90	89	61	43
		D.	1	1	.....	.....	.....	.....	1	1	1
		D. R.	21.74	11.36	.....	.....	.....	.....	11.24	16.39	23.26
	Females	P.	50	103	123	105	107	80	69	57	32
		D.	.....	.....	1	.....	2	2	.....	1	.....
		D. R.	.....	.....	8.13	.....	18.69	25.00	.....	17.54	.....
Mothers born in Russia and Poland.....	Males	P.	1,396	1,439	1,672	1,311	1,230	774	536	364	219
		D.	4	6	6	3	7	6	4	4	5
		D. R.	2.87	4.17	3.59	2.29	5.69	7.75	7.46	10.99	22.83
	Females	P.	1,670	1,544	1,255	969	825	573	434	304	179
		D.	4	8	10	6	5	4	3	3	8
		D. R.	2.40	5.18	7.97	6.19	6.06	6.98	6.91	9.87	44.69
Mothers born in other countries,	Males	P.	373	516	651	563	524	399	252	182	126
		D.	6	.....	2	.....	2	3	3	3	3
		D. R.	16.09	.....	3.07	.....	3.82	7.52	11.90	16.48	23.81
	Females	P.	389	454	438	451	341	248	185	135	97
		D.	4	2	6	5	1	3	.....	2	2
		D. R.	10.28	4.41	13.70	11.09	2.93	12.10	.....	14.81	20.62
Nativity unknown.....	Males	P.	69	147	191	123	106	81	70	50	32
		D.	3	6	15	22	27	21	31	32	32
		D. R.	.....	.....	.....	.....	.....	.....	.....	.....	.....
	Females	P.	61	113	100	94	66	53	38	39	20
		D.	2	10	12	14	19	18	24	22	30
		D. R.	.....	.....	.....	.....	.....	.....	.....	.....	.....
Colored.....	Males	P.	372	800	1,105	1,036	904	624	467	343	138
		D.	2	9	18	12	18	12	17	15	11
		D. R.	5.38	11.25	16.29	11.58	19.91	19.23	36.40	43.73	79.71
	Females	P.	394	754	873	647	543	359	308	219	121
		D.	6	8	13	10	7	15	6	6	3
		D. R.	15.23	10.61	14.89	15.46	12.89	41.78	19.48	27.40	24.79

Table 1.— 1900 Census Population, Deaths (Non-Residents Deducted), and Death Rates by Color, by Sex, by Age and of Whites by Birthplaces of Mothers.— *Continued.*

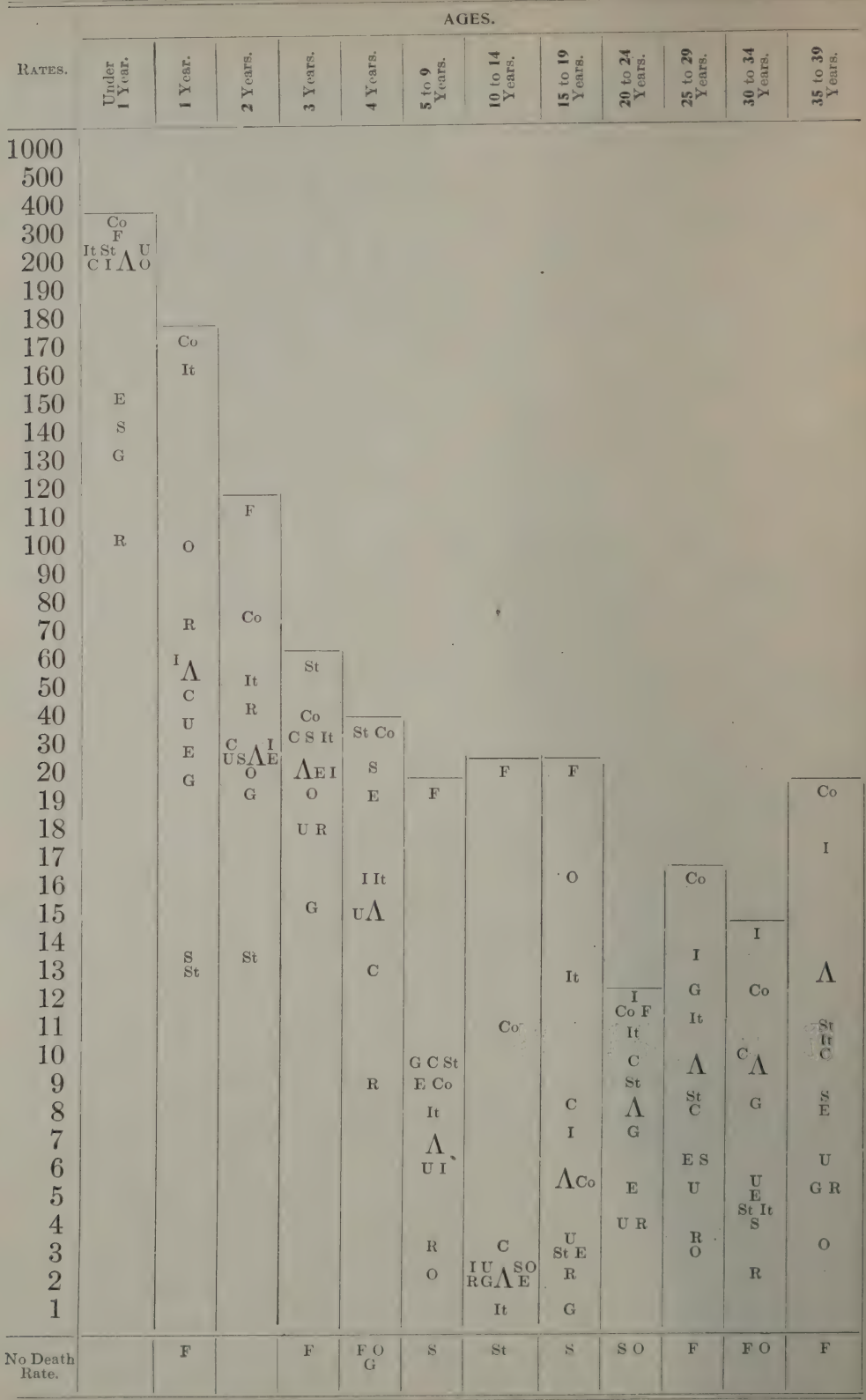
Mother Nativity.	Sex.		60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 to 94 Years.	95+Years.	Unknown.
Aggregate.....	.....	P.	13,689	8,724	5,828	3,302	1,617	552	168	29	2,768
		D.	530	577	496	373	301	150	56	15	.....
		D. R.	38.72	66.14	85.11	112.96	186.15	271.74	333.33	517.24	.....
Aggregate.....	Males	P.	6,168	3,800	2,387	1,299	535	176	41	13	1,967
		D.	263	262	209	148	108	48	16	3	.....
		D. R.	42.64	68.95	87.56	113.93	184.62	272.73	390.24	230.77	.....
	Females	P.	7,521	4,924	3,441	2,003	1,032	376	127	16	801
		D.	267	315	287	225	193	102	40	12	.....
		D. R.	35.50	63.97	83.41	112.33	187.02	271.28	314.96	750.00	.....
Whites.											
Aggregate.....	.....	P.	13,510	8,628	5,771	3,268	1,602	541	166	25	2,619
		D.	519	568	489	370	298	148	56	14	.....
		D. R.	38.42	65.83	84.73	113.22	186.02	273.57	337.35	560.00	.....
Aggregate.....	Males	P.	6,078	3,750	2,367	1,286	583	173	39	13	1,864
		D.	255	257	208	148	107	48	16	3	.....
		D. R.	41.95	68.53	87.87	115.09	183.53	277.46	410.26	230.77	.....
	Females	P.	7,432	4,878	3,404	1,982	1,019	368	127	12	755
		D.	264	311	281	222	191	100	40	11	.....
		D. R.	35.52	63.76	82.55	112.01	187.44	271.74	314.96	916.67	.....
Mothers born in United States...	Males	P.	2,313	1,549	1,041	617	293	100	23	3	122
		D.	64	72	71	39	46	23	6	1	.....
		D. R.	27.67	46.48	68.20	63.21	157.00	230.00	260.87	333.33	.....
	Females	P.	2,803	1,955	1,505	1,005	573	231	67	5	64
		D.	60	75	73	88	87	51	23	4	.....
		D. R.	21.41	38.36	48.50	87.56	151.83	220.78	343.28	800.00	.....
Mothers born in Ireland.....	Males	P.	2,055	1,206	715	343	166	42	13	7	189
		D.	101	108	55	51	29	9	6	2	.....
		D. R.	49.15	89.55	76.92	148.69	174.70	214.29	461.54	285.71	.....
	Females	P.	2,738	1,792	1,163	586	288	84	31	5	127
		D.	145	158	139	71	54	22	9	3	.....
		D. R.	52.96	88.17	119.52	121.16	187.50	261.90	290.32	600.00	.....
Mothers born in Germany.....	Males	P.	324	236	154	73	29	4	1	1	8
		D.	17	5	15	8	2	1	1	.....	.....
		D. R.	52.47	21.19	97.40	109.59	68.97	250.00	1,000.00	.....	.....
	Females	P.	339	225	160	89	23	10	4	.....	7
		D.	6	9	6	10	6	2	1	.....	.....
		D. R.	17.70	40.00	37.50	112.36	260.87	200.00	250.00	.....	.....
Mothers born in England and Wales.....	Males	P.	321	194	118	74	26	8	1	1	20
		D.	11	7	12	12	5	.....	.....	.....	.....
		D. R.	34.27	36.08	101.69	162.16	192.31	.....	.....	.....	.....
	Females	P.	334	210	153	81	39	12	8	.....	12
		D.	6	10	7	9	5	3	2	1	.....
		D. R.	17.96	47.62	45.75	111.11	128.21	250.00	250.00	.....	.....
Mothers born in Canada.....	Males	P.	371	223	143	68	21	5	.....	1	49
		D.	9	8	11	2	1	1	.....	.....	.....
		D. R.	24.26	35.87	76.92	29.41	47.62	200.00	.....	.....	.....
	Females	P.	644	312	199	103	53	15	9	.....	43
		D.	16	15	3	13	6	4	.....	.....	.....
		D. R.	24.84	48.08	15.08	126.21	113.21	266.67	.....	.....	.....
Mothers born in Scandinavia.....	Males	P.	82	36	12	7	3	2	.....	.....	13
		D.	1	2	.....	1	.....	.....	.....	.....	.....
		D. R.	12.20	55.56	.....	142.86	.....	.....	.....	.....	.....
	Females	P.	69	42	20	16	5	1	.....	.....	6
		D.	1	3	3	1	2	.....	.....	.....	.....
		D. R.	14.49	71.43	150.00	62.50	400.00	.....	.....	.....	.....

Table 1.—1900 Census Population, Deaths (Non-Residents Deducted), and Death Rates by Color, by Sex, by Age and of Whites by Birthplaces of Mothers.—*Concluded.*

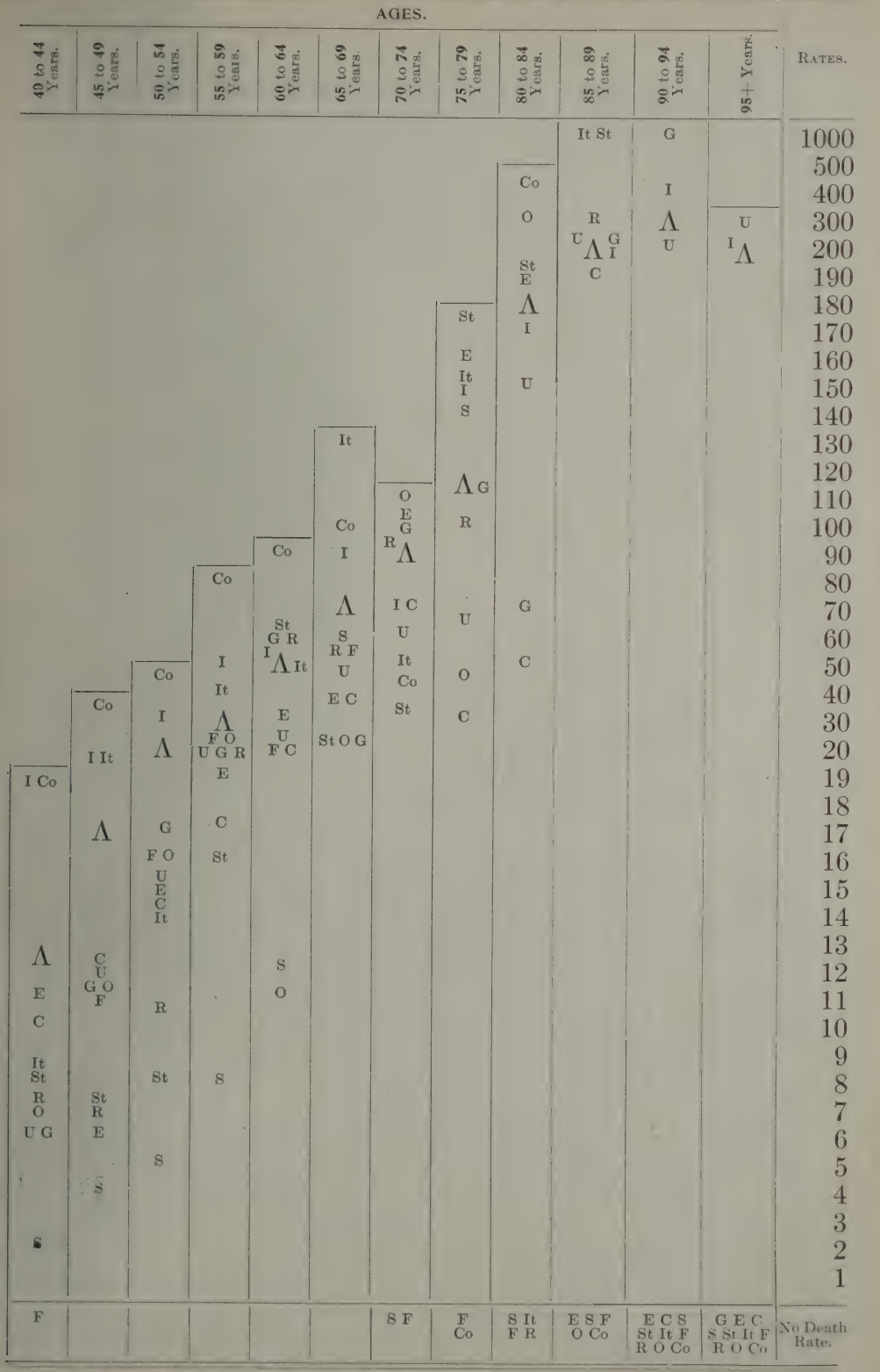
Mother Nativity.	Sex.		60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 to 94 Years.	95+Years.	Unknown.
Mothers born in Scotland	Males	P.	154	97	60	33	15	1	.....	.....	6
		D.	9	2	2	6	3	1	1	.....	.....
		D. R.	58.44	20.62	33.33	181.82	200.00	1,000.00	.....	.....	.....
	Females	P.	166	155	64	51	19	3	3	.....	6
		D.	6	11	9	5	6	.....	1	.....	.....
		D. R.	36.14	70.97	140.62	98.04	315.79	.....	333.33	.....	.....
Mothers born in Italy	Males	P.	144	45	39	13	7	1	1	.....	7
		D.	6	6	2	2	.....	1	.....	.....	.....
		D. R.	41.67	133.33	51.28	153.85	.....	1,000.00	.....	.....	.....
	Females	P.	93	49	36	9	9	6	2	2	1
		D.	1	.....	2	.....	2	1	.....	.....	.....
		D. R.	10.75	.....	55.56	.....	222.22	166.67	.....	.....	.....
Mothers born in France	Males	P.	44	19	12	8	.....	1	.....	.....	3
		D.	1	1	.....	.....	.....	.....	.....	.....	.....
		D. R.	22.73	52.63	.....	.....	.....	.....	.....	.....	.....
	Females	P.	27	16	16	9	4	1	.....	.....	1
		D.	1	.....	.....	.....	1	.....	1	.....	.....
		D. R.	37.04	.....	.....	.....	250.00	.....	.....	.....	.....
Mothers born in Russia and Poland	Males	P.	152	78	34	21	7	3	.....	.....	8
		D.	8	4	3	2	.....	1	.....	.....	.....
		D. R.	52.63	51.28	88.24	95.24	.....	333.33	.....	.....	.....
	Females	P.	118	54	30	7	1	2	.....	.....	3
		D.	1	4	3	2	1	.....	1	.....	.....
		D. R.	8.47	74.07	100.00	285.71	1,000.00	.....	.....	.....	.....
Mothers born in other countries	Males	P.	87	49	27	24	8	4	.....	.....	11
		D.	1	1	3	1	3	.....	.....	.....	.....
		D. R.	11.49	20.41	111.11	41.67	375.00	.....	.....	.....	.....
	Females	P.	76	53	45	22	4	.....	2	.....	1
		D.	1	4	1	1	1	1	.....	.....	.....
		D. R.	13.16	75.47	22.22	45.45	250.00	.....	.....	.....	.....
Nativity unknown,	Males	P.	31	18	12	5	8	2	.....	.....	1,428
		D.	27	41	34	24	18	11	2	.....	.....
		D. R.	.....	.....	.....	.....	.....	.....	.....	.....	.....
	Females	P.	25	15	13	4	1	3	1	.....	484
		D.	20	22	35	22	20	16	2	3	.....
		D. R.	.....	.....	.....	.....	.....	.....	.....	.....	.....
Colored	Males	P.	90	50	20	13	2	3	2	.....	103
		D.	8	5	1	.....	1	.....	.....	.....	.....
		D. R.	88.89	100.00	50.00	.....	500.00	.....	.....	.....	.....
	Females	P.	89	46	37	21	13	8	.....	4	46
		D.	3	4	6	3	2	2	.....	1	.....
		D. R.	33.71	86.96	162.16	142.86	153.85	250.00	.....	250.00	.....

Note.— Some of the high rates given in these tables are due to very small populations. Such rates should not be compared with rates based upon large populations.

1900 Death Rates of Males by Color, by Age, and of Whites by Birthplaces of Mothers

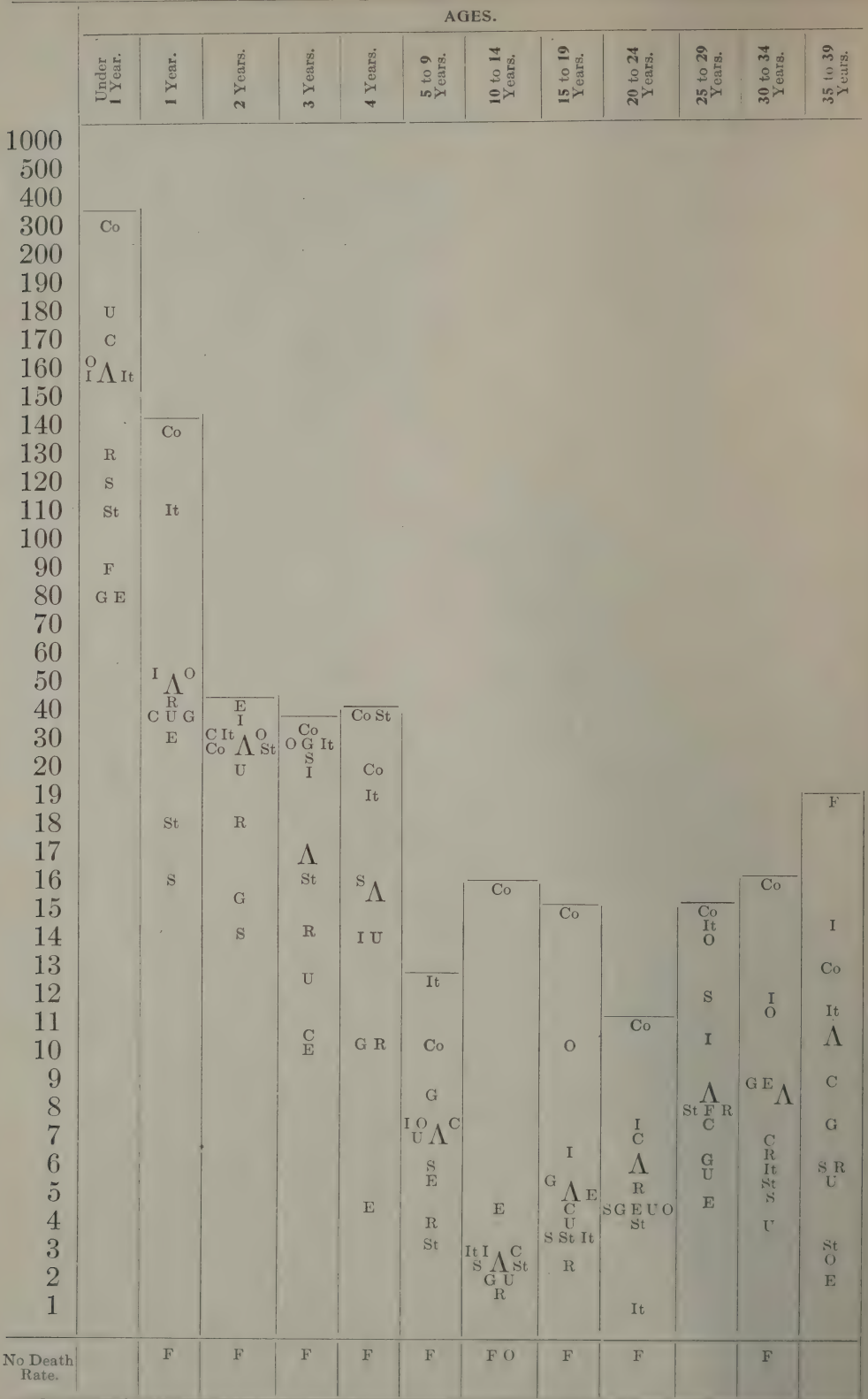


per 1,000 of Corresponding Population. (Deaths of Non-Residents Deducted.)

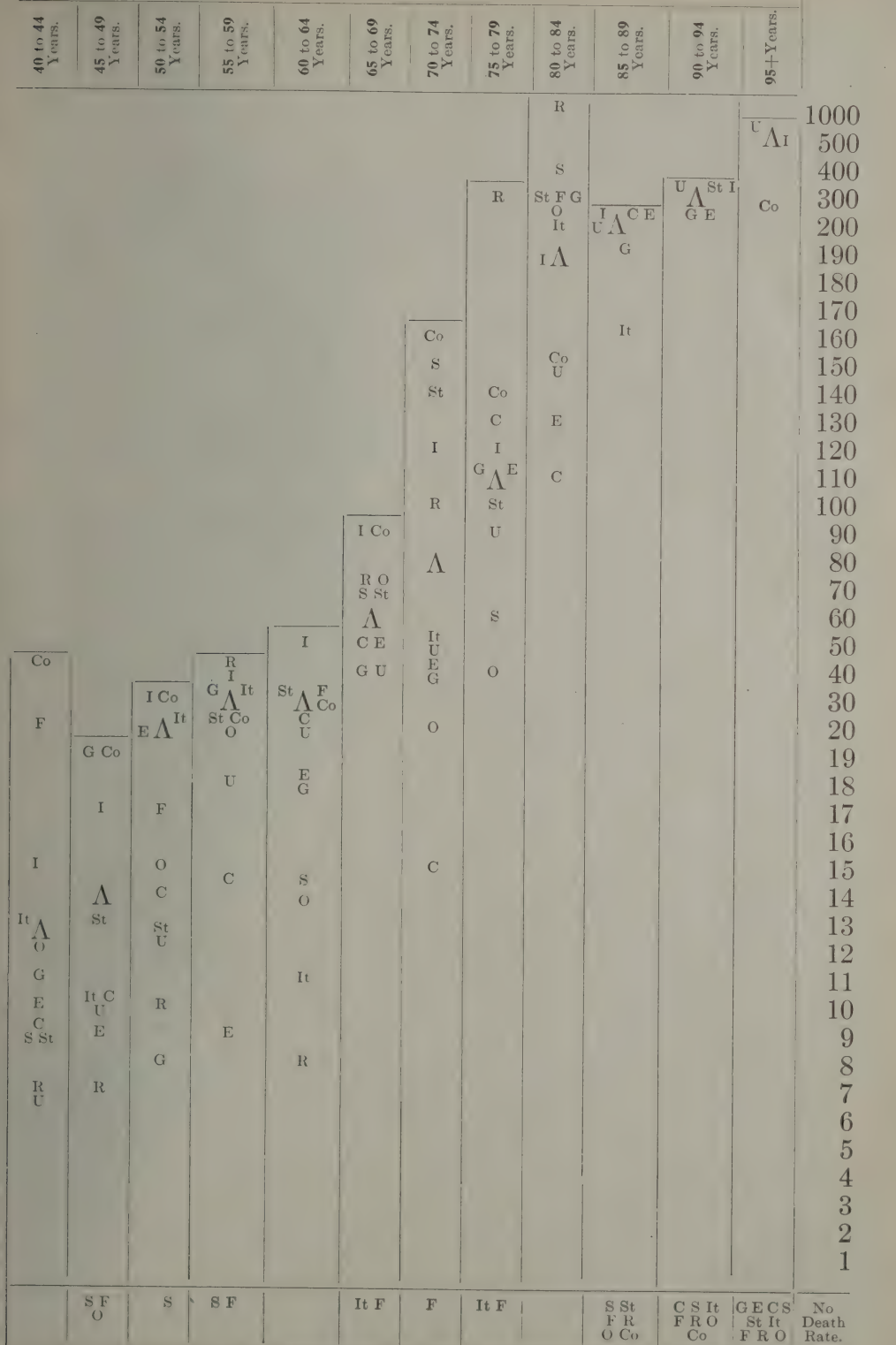


Italy—It; France—F; Russia and Poland—R; Other Countries—O; Colored—Co; All Males in Boston—A.

1900 Death Rates of Females by Color, by Age and of Whites by Birthplaces of Mothers



per 1,000 of Corresponding Population. (Deaths of Non-Residents Deducted.)



Italy—It; France—F; Russia and Poland—R; Other Countries—O; Colored—Co; All Females in Boston—A.

Table II. Boston,

Death Rates for Pulmonary Tuberculosis by Color, by Sex, by Age and for

(*Deaths of Non-*

Mother Nativity.	Sex.	All Ages.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
Aggregate	.....	2.398	2.245	.909	1.038	.263	.366	.994	.224	.330	2.225
Aggregate	Males...	2.655	2.896	.718	1.215	.530	.369	1.188	.122	.141	2.254
	Females.	2.151	1.598	1.105	.863	.....	.363	.800	.328	.520	2.198
For Whites Only.											
Aggregate	Males...	2.532	2.449	.728	1.059	.358	.188	.993	.124	.096	2.246
	Females.	2.069	1.467	.562	.879	.....	.185	.638	.250	.432	2.055
Mothers born in United States	Males...	1.269	3.373	.....	1.026	.....	.....	1.181	.....	.273	1.037
	Females.	1.040	.992	1.057	.....	.....	.....	.411	.....	.138	1.822
Mothers born in Ireland	Males...	4.284	2.505	1.426	1.348	.707	.....	1.231	.164	.....	3.732
	Females.	3.251	1.253	.....	2.117	.....	.....	.698	.651	.572	3.327
Mothers born in Germany	Males...	2.459	.....	.....	.....	.....	.....	.....	1.015	.....	1.099
	Females.	1.709	.....	.....	.....	.....	.....	.....	.....	1.105	1.046
Mothers born in England and Wales	Males...	.838	.....	.....	.....	.....	5.000	1.046	1.048	.....	.....
	Females.	1.175	.....	5.814	.....	.....	.....	1.034	.....	1.151	.....
Mothers born in Canada	Males...	2.554	2.460	.....	2.614	.....	.....	1.060	.....	.....	4.140
	Females.	2.190	2.381	.....	1.361	.....	.....	.791	.308	1.003	2.382
Mothers born in Scandinavia	Males...	1.105	.....	.....	.....	.....	.....	.....	.....	.....	.....
	Females.	2.218	6.494	.....	7.246	.....	.....	2.976	1.916	.....	.....
Mothers born in Scotland	Males...	2.762	.....	.....	.....	.....	.....	.....	.....	.....	.....
	Females.	1.631	.....	.....	.....	.....	.....	.....	.....	.....	3.003
Mothers born in Italy	Males...	1.896	2.500	3.134	.....	.....	.....	1.241	.....	.....	2.334
	Females.	.461	.....	.....	.....	.....	.....	.....	.....	.....	.....
Mothers born in France	Males...	2.000	90.909	.....	.....	.....	.....	17.544	.....	.....	.....
	Females.	1.068	.....	.....	.....	.....	.....	.....	.....	.....	.....
Mothers born in Russia and Poland	Males...	.723	.....	.....	.....	1.996	.....	.424	.....	.....	.....
	Females.	.288	1.946	.....	.....	.....	2.088	.840	.....	.....	.....
Mothers born in other countries	Males...	1.171	.....	.....	.....	.....	.....	.....	.....	.....	5.362
	Females.	2.136	8.197	.....	.....	.....	.....	1.988	.....	.....	5.141
Nativity unknown, number of deaths	Males...	37	.....	1	.....	.....	.....	1	.....	.....	2
	Females.	33	.....	.....	.....	.....	.....	.....	.....	.....	.....
Colored	Males...	7.324	32.967	.....	10.417	12.346	11.111	13.699	.....	3.636	2.688
	Females.	6.131	8.197	32.967	.....	.....	10.000	9.843	5.051	6.192	10.152

Deaths classified according to the 1909 revision of the International

1900.

Whites by Birthplaces of Mothers per 1,000 of Corresponding Population.
Residents Deducted.)

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 to 94 Years.	95+ Years.
3.007	3.961	3.123	3.234	3.440	2.570	2.837	2.697	1.826	3.783	2.745	3.937	3.092	1.812	....	....
3.550	4.156	3.426	3.660	3.442	3.433	3.688	2.758	2.594	5.789	2.933	3.849	1,709	5,682	....	....
2.558	3.774	2.802	2.787	3.438	1.733	2.017	2.641	1.197	2.234	2.616	3.994	3.876	.....	.....	....
3.543	3.947	3.301	3.548	3.286	3.108	3.625	2.551	2.468	5.600	2.957	3.888	1.715	5.780	....	....
2.524	3.721	2.795	2.722	3.225	1.700	1.971	2.561	1.211	2.255	2.350	4.036	3.925	.....	.....	....
1.963	2.451	1.594	.875	.982	2.363	2.287	1.379	.432	2.582	1.921	.....	.....	.....	.....	....
1.689	2.505	.786	.908	1.393	.444	.482	1.251	.357	2.558	3.322	.....	1.745	.....	.....	....
6.104	6.469	5.537	5.673	5.483	4.564	4.889	3.186	4.380	8.292	1.399	5.831	6.024	.....	.....	....
3.027	5.436	4.170	4.460	4.815	2.746	4.032	2.685	3.219	1.116	1.720	6.826	3.472	.....	.....	....
2.882	5.150	3.805	2.441	2.812	.....	6.329	4.396	.....	.....	12.987	.....	.....	.....	.....	....
.841	3.203	3.234	3.721	3.429	.....	.....	.....	.....	4.444	.....	11.236	.....	.....	.....	....
.....	1.589	.756	1.693	3.233	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....
.....	3.120	2.627	.....	1.099	1.453	1.631	4.535	.....	.....	.....	.....	.....	.....	.....	....
4.231	2.897	3.217	3.846	3.977	2.591	2.294	3.559	2.695	.....	6.993	14.706	.....	.....	.....	....
3.486	2.656	2.444	2.361	5.023	2.497	.....	.....	1.553	6.410	.....	9.709	.....	.....	.....	....
.....	1.553	2.681	3.252	2.404	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....
2.967	3.932	3.101	4.000	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....
5.731	.....	1.546	6.932	2.278	5.128	5.731	.....	.....	10.309	.....	30.303	.....	.....	.....	....
1.965	1.595	1.678	.....	2.141	2.646	.....	.....	.....	6.452	15.625	.....	52.632	.....	.....	....
3.683	2.911	1.495	1.978	1.200	1.984	.....	5.525	6.944	44.444	.....	.....	.....	.....	.....	....
1.175	.....	1.406	.....	.....	.....	.....	14.493	.....	.....	.....	.....	.....	.....	.....	....
11.364	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....
.....	8.130	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....
.....	1.196	.763	1.626	2.584	.....	.....	4.566	13.158	.....	.....	.....	.....	.....	.....	....
.....	.797	.....	.....	.....	.....	.....	5.587	.....	.....	.....	.....	.....	.....	.....	....
.....	1.536	.....	1.908	.....	3.968	.....	7.937	.....	.....	.....	.....	.....	.....	.....	....
2.203	4.566	2.217	.....	.....	.....	7.407	.....	.....	.....	.....	.....	.....	.....	.....	....
2	5	3	3	2	4	6	1	1	4	1	1	.....	1	.....	....
7	3	4	4	3	2	2	5	.....	.....	.....	2	1	.....	.....	....
3.750	9.955	6.757	6.637	8.013	12.848	5.831	14.493	11.111	20.000	.....	.....	.....	.....	.....	....
3.979	5.727	3.091	5.525	13.928	3.247	4.566	8.264	.....	.....	27.027	.....	.....	.....	.....	....

Classification of Causes of Death. Diseases 28 and 29 used for this table.

Table III. Boston,

Death Rates for Pneumonia and Broncho-Pneumonia by Color, by Sex, by Age

(*Deaths of Non-*

Mother Nativity.	Sex.	All Ages.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.	20 to 24 Years.
Aggregate.....	.....	2.057	17.718	10.903	3.894	1.841	.550	7.200	.327	.189	.379	.553
Aggregate.....	Males...	2.117	19.630	12.558	3.472	2.295	.739	7.999	.204	.236	.601	.840
	Females.	2.000	15.820	9.205	4.313	1.393	.363	6.404	.451	.142	.179	.316
For Whites Only.												
Aggregate.....	Males...	2.076	19.432	12.013	3.354	2.328	.563	7.804	.207	.239	.612	.787
	Females.	1.998	15.645	8.613	4.394	1.415	.370	6.271	.458	.144	.183	.291
Mothers born in United States..	Males...	1.700	15.904	10.571	2.051	1.063	1.116	6.361	.....	.409	.593	.245
	Females.	1.624	14.378	5.285	4.034	1.010	.....	5.033	.486	.....	.....	.362
Mothers born in Ireland.....	Males...	2.463	16.907	9.979	1.348	2.829	.706	6.562	.164	.388	.589	1.429
	Females.	2.460	14.411	10.347	3.528	2.082	.....	6.279	.489	.381	.166	.189
Mothers born in Germany.....	Males...	.738	10.256	5.128	.....	.....	.....	3.175	.....	.....	.....	.961
	Females.	1.196	.....	5.917	.....	.....	.....	1.120	1.045	.....	.....	.841
Mothers born in England and Wales.....	Males...	1.759	9.950	.....	5.814	.....	.....	3.138	2.096	.....	1.170	1.076
	Females.	1.427	10.309	.....	5.376	.....	.....	3.102	.....	.....	1.189	.863
Mothers born in Canada.....	Males...	1.230	19.680	8.163	3.832	2.608	.....	7.152	.....	.....	.376	1.128
	Females.	1.082	14.286	5.464	1.361	.....	.....	4.480	.....	.....	.298	.367
Mothers born in Scandinavia....	Males...	1.105	20.134	6.944	.....	.....	.....	5.736	.....	.....	.....	.....
	Females.	.924	12.987	.....	.....	7.752	8.000	5.952	.....	.....	.....	.....
Mothers born in Scotland.....	Males...	.789	33.898	.....	.....	14.925	.....	8.982	.....	.....	.....	.....
	Females.	1.269	15.873	.....	.....	.....	.....	3.096	.....	.....	.....	.....
Mothers born in Italy.....	Males...	5.774	70.000	47.022	17.804	10.033	.....	32.258	.816	.....	.....	.921
	Females.	5.070	33.860	28.213	14.451	6.452	3.891	19.104	2.636	1.166	1.372	.....
Mothers born in France.....	Males...	3.000	.....	.....	111.11	.....	.....	17.544	.....	.....	21.739	.....
	Females.	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
Mothers born in Russia and Poland.....	Males...	.985	6.024	14.458	4.184	1.996	.....	5.087	.....	.....	.....	.....
	Females.	1.296	11.673	14.706	5.988	.....	.....	6.300	.....	.....	.....	.....
Mothers born in other countries,	Males...	1.366	18.018	9.901	.....	.....	.....	6.098	.....	.....	5.362	.....
	Females.	1.661	32.787	10.753	10.638	.....	.....	11.928	.....	.....	.....	.....
Nativity unknown, number of deaths.....	Males...	40	1	2	.....	.....	.....	3	1	.....	.....	.....
	Females.	40	2	1	1	.....	.....	4	.....	.....	.....	.....
Colored.....	Males...	3.662	32.967	50.000	10.417	.....	11.111	20.595	.....	.....	.....	2.500
	Females.	2.102	24.590	43.956	.....	.....	.....	13.780	.....	.....	.....	1.326

Deaths classified according to the 1909 revision of the International Classification

and for Whites by Birthplaces of Mothers per 1,000 of Corresponding Population.
Residents Deducted.)

25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 to 94 Years.	95+ Years.
.724	1.023	1.154	1.409	1.796	2.302	3.476	5.041	8.368	9.094	13.022	21.645	25.362	23.810	34.483
.913	1.049	1.368	1.271	2.146	2.347	3.385	4.864	9.474	7.122	8.468	13.675	28.409	.....	.....
.543	.996	.929	1.553	1.456	2.259	3.559	5.185	7.514	10.462	15.976	26.163	23.936	31.496	62.500
.881	1.052	1.377	1.205	1.998	2.330	3.189	4.442	9.600	7.182	8.553	13.722	28.902	.....	.....
.496	1.020	.951	1.584	1.417	2.300	3.609	5.248	7.585	10.576	15.641	26.497	24.457	31.496	83.333
.584	.725	1.400	.196	1.890	1.524	2.069	4.323	4.519	7.685	3.241	13.652	20.000	.....	.....
.376	.315	.363	.995	1.553	.723	1.876	1.427	3.581	5.316	13.930	24.433	17.316	59.701	.....
1.255	1.538	1.475	2.193	2.826	3.603	5.177	6.087	14.925	8.392	8.746	12.048	47.619	.....	.....
.892	1.589	1.449	2.019	1.961	3.360	5.371	9.131	12.277	13.758	13.652	24.306	23.810	.....	.....
1.717	.....	.....	.....	1.451	.....	2.198	3.086	.....	.....	.....	.....	.....	.....	.....
.....	1.617	.930	.....	.....	1.938	2.703	.....	4.455	18.750	22.472	.....	.....	.....	.....
1.589	.756	2.540	2.155	.....	1.456	.....	3.115	.....	8.475	27.027	38.462	.....	.....	.....
.....	.....	.....	.....	1.453	4.894	.....	5.988	4.762	6.536	37.037	25.641	.....	.....	.....
.....	.585	.699	.....	.....	1.147	.....	.....	8.969	.....	.....	.....	.....	.....	.....
.190	.489	.885	2.283	.....	1.638	1.217	7.764	8.070	.....	9.709	.....	.....	.....	.....
1.553	.....	1.626	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
.....	.....	.....	2.907	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
.....	.....	.....	.....	.....	.....	.....	6.494	.....	.....	.....	.....	.....	.....	.....
.....	.....	.....	.....	.....	.....	9.050	6.024	12.903	15.625	.....	.....	.....	.....	.....
.....	1.495	1.978	2.401	3.968	2.695	11.050	.....	22.222	.....	76.923	.....	.....	.....	.....
.....	1.406	1.795	4.264	.....	.....	7.246	.....	.....	27.778	.....	.....	.....	.....	.....
.....	.....	.....	.....	.....	.....	23.256	.....	.....	.....	.....	.....	.....	.....	.....
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
.....	.....	.813	.....	.....	.....	.....	6.579	12.821	.....	.....	.....	.....	.....	.....
.....	1.032	.....	.....	2.304	.....	5.587	.....	.....	.....	.....	.....	.....	.....	.....
.....	.....	1.908	2.506	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
.....	2.217	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	4	2	2	3	4	2	1	7	2	3	1	1	.....	.....
1	2	2	2	1	4	3	2	2	6	3	4	3	.....	1
1.810	.965	1.105	3.212	6.424	2.916	14.493	33.333	.....	.....	.....	.....	.....	.....	.....
2.291	.....	.....	.....	3.247	.....	.....	.....	.....	.....	47.619	.....	.....	.....	.....

of Causes of Deaths. Diseases 91 and 92 used for this table.

Table IV. Boston,

Death Rates for Cancer by Color, by Sex, by Age and for Whites

(*Deaths of Non-*

Mother Nativity.	Sex.	All Ages.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.	20 to 24 Years.
Aggregate		.767	.080			.088		.035		.047	.024	.035
Aggregate	Males	.567	.161			.177		.070		.047	.051	
	Females	.958								.047		.063
For Whites Only.												
Aggregate	Males	.573	.163			.179		.071		.048	.051	
	Females	.952								.048		.061
Mothers born in United States	Males	.335										
	Females	.970										
Mothers born in Ireland,	Males	.667										
	Females	1.040										.095
Mothers born in Germany	Males	.820										
	Females	.940										
Mothers born in England and Wales	Males	.838										
	Females	.839										
Mothers born in Canada,	Males	.473	1,230					.265			.376	
	Females	.515										
Mothers born in Scandinavia	Males	.368										
	Females	.370										
Mothers born in Scotland	Males	.395				14.925		2.994				
	Females	1.087										
Mothers born in Italy	Males	.172										
	Females	.346										
Mothers born in France,	Males											
	Females											
Mothers born in Russia and Poland	Males	.526								.602		
	Females	.360								.633		.648
Mothers born in other countries	Males	.585										
	Females	.474										
Nativity unknown, number of deaths	Males	18										
	Females	29										
Colored	Males	.423										
	Females	1.226										

Deaths classified according to the 1909 revision of the International Classification

1900.

by Birthplaces of Mothers per 1,000 of Corresponding Population.

Residents Deducted.)

25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 to 94 Years.	95+ Years.
.123	.215	.514	.813	1.760	2.302	3.656	4.310	5.044	7.721	6.663	3.092	10.870	....	....
.063	.175	.402	.318	1.502	1.257	3.009	3.405	3.158	9.217	7.698	3.419	11.105	....	....
.181	.258	.633	1.331	2.011	3.308	4.248	5.053	6.499	6.684	5.991	2.907	10.638	....	....
.065	.181	.417	.329	1.480	1.208	2.934	3.455	3.200	9.294	7.776	3.431	11.561	....	....
.155	.264	.481	1.245	2.055	3.121	4.308	5.113	.656	5.367	6.054	2.944	10.870	....	....
.117	.145	.175	.....	.709	.....	1.379	2.162	.646	6.724	6.483	.....	.....	.....	....
.251	.157	.363	.796	1.775	2.892	4.690	3.924	4.604	4.651	6.965	3.490	12.987	....	....
.097	.103	.454	.627	1.956	1.544	3.186	4.866	3.317	4.196	14.577	.....	.....	....	....
.081	.199	.892	.777	1.765	3.136	3.021	7.305	7.254	7.739	6.826	.....	11.905	....	....
.....	.761	.....	.937	2.903	1.582	.....	6.173	.....	19.481	.....	.....	.....	....	....
.....	.808	.....	5.714	1.605	1.938	5.405	.....	4.444	.....	.....	.....	.....	....	....
.....	.756	.....	.....	.....	1.456	2.183	.....	5.155	33.898	13.514	38.461	.....	....	....
.....	.....	.834	1.099	2.907	3.263	.....	.....	9.524	6.536	12.346	.....	.....	....	....
.....	.292	.....	.....	3.454	2.294	3.559	2.695	.....	13.986	.....	.....	.....	....	....
.....	.489	.590	1.370	1.873	.819	4.866	4.658	3.205	5.025	.....	.....	.....	....	....
.....	.....	.....	.....	.....	5.102	8.696	.....	.....	.....	.....	.....	.....	....	....
.....	.....	.....	.....	.....	.....	.....	.....	23.810	50.000	.....	.....	.....	....	....
.....	.....	.....	.....	.....	.....	.....	.....	.....	16.667	.....	.....	.....	....	....
.....	1.678	.....	2.141	.....	3.030	4.525	6.024	.....	15.625	.....	.....	.....	....	....
.....	.....	1.978	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....
.....	.....	1.795	.....	3.436	3.505	.....	.....	.....	.....	.....	.....	.....	....	....
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....
.....	.....	2.439	.....	1.866	.....	4.566	6.579	12.821	.....	.....	.....	.....	....	....
.797	.....	.....	.....	.....	3.289	5.587	.....	.....	.....	.....	.....	.....	....	....
.....	.....	.....	2.506	.....	10.989	.....	.....	.....	.....	.....	.....	.....	....	....
.....	.....	.....	4.032	.....	.....	.....	.....	18.868	.....	.....	.....	.....	....	....
.....	.....	.....	.....	1	1	6	2	5	2	.....	.....	1	....	....
1	.....	.....	2	5	5	5	3	4	3	.....	1	.....	....	....
.....	.....	.....	.....	2.141	2.915	7.246	.....	.....	.....	.....	.....	.....	....	....
1.145	.....	1.842	5.571	.....	13.699	.....	.....	.....	.....	.....	.....	.....	....	....

of Causes of Death. Diseases 39 to 45 inclusive used for this table.

Table V. Boston,

Death Rates for Heart Disease and Nephritis by Color, by Sex, by Age and

(*Deaths of Non-*

Mother Nativity.	Sex.	All Ages.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.	20 to 24 Years.	25 to 29 Years.
Aggregate		2.414	.882			.263	.366	.314	.450	.401	.473	.588	1.002
Aggregate	Males	2.408	.644				.739	.279	.449	.283	.451	.573	1.039
	Females	2.353	1.119			.522		.348	451	.520	.494	.600	.966
For Whites Only.													
Aggregate	Males	2.371	.653				.751	.284	.455	.287	.459	.591	1.044
	Females	2.399	1.141			.531		.354	.458	.528	.457	.615	.930
Mothers born in United States	Males	2.323	.964				1.116	.417	.603	.273	.593	.368	1.050
	Females	1.987	1.487			.505		.411	.243	.965	.281	.603	.501
Mothers born in Ireland	Males	2.949	.626					.137	.491	.388	.393	1.169	1.158
	Females	3.370	1.253			.694		.419	.814	.381	.665	1.040	.730
Mothers born in Germany	Males	1.639								1.064		.961	.858
	Females	1.965									1.046		.801
Mothers born in England and Wales	Males	2.095							2.096		1.170		
	Females	.839											
Mothers born in Canada	Males	.946					1.439	.265	.305	.357		.564	.483
	Females	1.185	1.190					.264	.615	.334	.298	.367	1.328
Mothers born in Scandinavia	Males	.368											
	Females	1.294											2.621
Mothers born in Scotland	Males	2.565											
	Females	1.993											
Mothers born in Italy	Males	1.724					3.891	.620			1.167		.363
	Females	.807	2.257					.597	.879				1.202
Mothers born in France	Males	1.000											
	Females	2.137											
Mothers born in Russia and Poland	Males	.657										.694	.598
	Females	1.584							.511		.599	.648	3.187
Mothers born in other countries	Males	1.366	9.009					2.033			2.681		1.536
	Females	1.424				9.502		1.988					2.283
Nativity unknown, number of deaths	Males	70											1
	Females	58								1	1		1
Colored	Males	3.803											.905
	Females	3.328									2.538		2.291

Deaths classified according to the 1909 revision of the International Classification

1900.

for Whites by Birthplaces of Mothers per 1,000 of Corresponding Population.

Residents Deducted.)

30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 to 94 Years.	95+Years.
1.023	1.689	2.221	3.711	5.427	7.910	9.862	18.455	23.679	23.069	33.395	38.044	17.857	68.966
.909	1.730	2.118	3.290	5.952	9.527	12.159	21.579	24.717	26.174	32.479	39.773	48.780	.....
1.143	1.647	2.329	3.952	4.922	6.429	7.977	16.044	22.958	20.969	33.915	37.234	7.874	.....
.907	1.541	1.971	3.182	5.610	9.312	12.175	21.600	24.504	26.439	32.590	40.462	51.283	.....
1.095	1.642	2.207	3.968	5.010	6.404	7.804	15.990	22.615	20.606	33.366	38.044	7.874	.....
.580	1.225	2.160	3.308	5.081	6.897	8.214	14.848	24.016	17.828	27.304	.....	43.478	.....
.944	.363	.796	2.884	3.615	5.003	5.351	10.742	16.611	11.940	22.688	12.987	14.925	.....
1.128	2.837	2.663	3.043	7.205	13.142	14.599	29.851	13.986	34.985	30.120	.....	76.923	.....
1.390	2.899	3.573	4.903	6.944	9.399	10.592	21.205	27.515	20.478	48.611	47.619	.....	.....
.761	1.627	.....	.....	4.747	6.593	9.259	8.475	12.987	13.699	.....	.....	.....	.....
.....	.930	1.143	.963	1.938	5.405	11.799	8.889	12.500	11.236	43.478	.....	.....	.....
1.512	.....	.....	2.646	2.911	4.367	15.576	10.309	33.898	40.541	.....	.....	.....	.....
.876	.834	3.297	1.453	.....	.....	.....	4.762	6.536	12.346	.....	.....	.....	.....
.877	.699	.568	2.591	4.587	3.559	8.086	.....	27.972	14.706	.....	.....	.....	.....
.733	1.180	.....	1.873	4.914	3.650	4.658	9.615	.....	38.835	18.868	133,333	.....	.....
.....	1.626	.....	.....	.....	.....	.....	27.778	.....	.....	.....	.....	.....	.....
.....	.....	2.907	.....	.....	.....	.....	.....	100.000	62.500	200.000	.....	.....	.....
1.546	.....	2.278	.....	.....	12.658	25.974	10.309	.....	60.606	66.667	.....	.....	.....
.....	.....	.....	5.291	.....	4.525	12.048	6.452	46.875	19.608	52.632	.....	.....	.....
.....	.....	1.200	7.937	.....	16.575	20.833	44.444	.....	.....	.....	.....	.....	.....
.....	.....	4.264	.....	.....	7.246	.....	.....	.....	.....	.....	.....	.....	.....
.....	.....	.....	.....	.....	.....	.....	52.632	.....	.....	.....	.....	.....	.....
.....	9.346	.....	.....	17.544	.....	.....	.....	.....	.....	.....	.....	.....	.....
.....	.....	1.292	.....	8.242	4.566	.....	12.821	.....	.....	.....	.....	.....	.....
4.128	.....	3.490	2.304	3.289	11.173	8.475	37.037	33.333	142.857	.....	.....	.....	.....
.....	.....	.....	3.968	.....	7.937	.....	.....	37.037	.....	125.000	.....	.....	.....
.....	.....	4.032	.....	.....	.....	.....	18.868	22.222	45.455	.....	.....	.....	.....
3	1	3	6	6	6	9	13	12	4	4	2	.....	.....
1	3	2	5	6	2	4	7	11	7	4	3	.....	.....
.965	6.637	6.410	6.424	17.493	21.739	11.111	20.000	50.000	.....	.....	.....	.....	.....
3.091	1.842	8.357	3.247	.....	8.264	22.472	21.739	54.054	47.619	76.923	.....	.....	250.000

of Causes of Deaths. Diseases 79, 119 and 120 used for this table.

TABLE NO. VI.

Amounts which Each Division of the Population Raised Boston's Rate in 1900.

(The rates of those having mothers born in the United States taken as standard.)

	Entire Population.	Whites by Birthplaces of Mothers.												
		United States.	Ireland.	Germany.	England and Wales.	Canada.	Scandinavia.	Scotland.	Italy.	France.	Russia and Poland.	Other Countries.	Unknown.	Colored.
Actual deaths	10,880	2,835	3,967	326	319	1,064	118	164	484	24	363	140	715	361
Actual amounts of city's rate produced by each division of the population.	19.40	5.05	7.07	.58	.57	1.90	.21	.29	.86	.043	.65	.25	1.28	.64
Theoretical number of deaths if the standard rates had prevailed.	8,217	2,835	2,400	320	328	918	153	140	346	25	440	132	27	154
Theoretical amounts of city's rate produced by each division of the population if the standard rates had prevailed.	14.65	5.05	4.28	.57	.59	1.64	.27	.25	.61	.045	.79	.24	.05	.27
Net effect upon the number of deaths	+2,663	.....	+1,567	+6	—9	+146	—35	+24	+138	—1	—77	+8	+688	+207
Net effect upon Boston's rate	+4.75	.....	+2.79	+.01	—.02	+.26	—.06	+.04	+.25	—.002	—.14	+.01	+1.23	+.37

TABLE NO. VII.

Males.

The Excess Deaths of Those Having Mothers Born in Ireland. (The rates of those having mothers born in United States taken as standard.)

Age Period.	Actual Deaths Among Males Having Mothers Born in Ireland.	Theoretical Deaths Among Males Having Mothers Born in Ireland (if the Rates of Those Having Mothers Born in United States had Prevailed).	Excess of Actual Deaths Over Theoretical Deaths.	Principal Causes of Excess Deaths, with Number of Such Deaths Due to Each Cause.
All ages	1,950	1,203	747	Tuberculosis ..... 259 Pneumonia ..... 62 Violent deaths ..... 60 Heart disease ..... 56 Cancer ..... 35 Chronic bronchitis ..... 33 Cerebral hemorrhage ..... 29 Alcoholism ..... 28 Bright's disease ..... 17 Diphtheria ..... 16 Hernia and Intestinal obstruction ..... 15 Typhoid fever 14
15–19	37	20	17	Pulmonary tuberculosis ..... 13 Typhoid fever 5
20–24	91	35	56	Pulmonary tuberculosis ..... 32 Pneumonia ..... 8 Organic heart disease ..... 5 Violent 3
25–29	139	54	85	Pulmonary tuberculosis ..... 41 Violent ..... 10 Pneumonia ..... 7 Alcoholism ..... 5 Heart disease ..... 5 Cerebral hemorrhage 3
30–34	141	55	86	Pulmonary tuberculosis ..... 40 Alcoholism ..... 11 Pneumonia ..... 8 Violent ..... 6 Heart disease ..... 4 Diarrhœa 4
35–39	151	59	92	Pulmonary tuberculosis ..... 41 Heart disease ..... 7 Bright's disease ..... 5 Alcoholism ..... 5 Diseases of arteries 4
40–44	124	41	83	Pulmonary tuberculosis ..... 26 Pneumonia ..... 12 Violent ..... 12 Cancer ..... 4 Ill-defined 3
45–49	92	57	35	Pulmonary tuberculosis ..... 10 Cancer ..... 5 Chronic bronchitis ..... 3 Pneumonia ..... 3 Diseases of stomach ..... 3 Violent 3
50–54	112	59	53	Pulmonary tuberculosis ..... 10 Pneumonia ..... 8 Cancer ..... 6 Chronic bronchitis ..... 5 Violent ..... 5 Hernia ..... 4 Heart disease ..... 3 Angina pectoris 3

TABLE NO. VII. (Concluded.)

Males.

The Excess Deaths of Those Having Mothers Born in Ireland. (The rates of those having mothers born in United States taken as a standard.)

Age Period.	Actual Deaths Among Males Having Mothers Born in Ireland.	Theoretical Deaths Among Males Having Mothers Born in Ireland (if the Rates of Those Having Mothers Born in United States had Prevailed).	Excess of Actual Deaths Over Theoretical Deaths.	Principal Causes of Excess Deaths, with Number of Such Deaths Due to Each Cause.	
55–59	119	55	54	Pneumonia	8
				Cerebral hemorrhage	8
				Bright's disease	7
				Chronic bronchitis	5
				Cancer	4
				Alcoholism	3
				Angina pectoris	3
				Hernia	3
				Violent	3
60 64	101	57	44	Pulmonary tuberculosis	8
				Cancer	5
				Cerebral hemorrhage	5
				Heart disease	5
				Violent	4
				Bright's disease	3
65–69	108	56	52	Heart disease	11
				Pneumonia	10
				Pulmonary tuberculosis	7
				Chronic bronchitis	5
				Cerebral hemorrhage	3
				Diarrhœa	3

TABLE NO. VIII.

Females.

The Excess Deaths of Those Having Mothers Born in Ireland. (The rates of those having mothers born in United States taken as a standard.)

Age Period.	Actual Deaths Among Females Having Mothers Born in Ireland.	Theoretical Deaths Among Females Having Mothers Born in Ireland (if the Rates of Those Having Mothers Born in United States had Prevailed).	Excess of Actual Deaths Over Theoretical Deaths.	Principal Causes of Excess Deaths, with Number of Such Deaths Due to Each Cause.
All ages	2,017	1,197	820	Pulmonary tuberculosis ..... 221 Heart disease ..... 109 Pneumonia ..... 93 Brights disease ..... 45 Chronic bronchitis ..... 36 Old age ..... 32 Cerebral hemorrhage ..... 26 Cancer ..... 24 Violent ..... 23 Diarrhœa (under two years) ..... 18 Diarrhœa (over two years) ..... 15 Cirrhosis ..... 15 Hernia and intestinal obstruction ... 14 Broncho-pneumonia ..... 13 Alcoholism 11
15–19	37	23	14	Pulmonary tuberculosis 7
20–24	80	46	34	Pulmonary tuberculosis ..... 14 Heart disease 3
25–29	124	71	53	Pulmonary tuberculosis ..... 36 Heart disease ..... 4 Pneumonia 4
30–34	118	41	77	Pulmonary tuberculosis ..... 34 Pneumonia ..... 12 Puerperal septicæmia ..... 5 Alcoholism ..... 5 Heart disease 4
35–39	129	47	82	Pulmonary tuberculosis ..... 31 Heart disease ..... 11 Bright's disease ..... 10 Pneumonia ..... 9 Cancer 5
40–44	101	42	59	Pulmonary tuberculosis ..... 23 Heart disease ..... 11 Bright's disease ..... 4 Pneumonia 3
45–49	86	51	35	Pulmonary tuberculosis ..... 11 Heart disease 8
50–54	125	54	71	Pulmonary tuberculosis ..... 15 Pneumonia ..... 12 Heart disease ..... 10 Cerebral Hemorrhage ..... 9 Bronchitis ..... 5 Bright's disease 3
55–59	119	55	64	Pneumonia ..... 9 Cerebral hemorrhage ..... 7 Heart disease ..... 7 Pulmonary tuberculosis ..... 4 Chronic bronchitis ..... 4 Cirrhosis ..... 4 Bright's disease ..... 4 Violent 4

TABLE NO. VIII. (Concluded).

Females.

The Excess Deaths of Those Having Mothers Born in Ireland. (The rates of those having mothers born in United States taken as a standard.)

Age Period.	Actual Deaths Among Females Having Mothers Born in Ireland.	Theoretical Deaths Among Females Having Mothers Born in Ireland (if the Rates of Those Having Mothers Born in United States had Prevailed).	Excess of Actual Deaths Over Theoretical Deaths.	Principal Causes of Excess Deaths, with Number of Such Deaths Due to Each Cause.	
60–64	145	59	86	Pneumonia	17
				Cerebral hemorrhage	13
				Bright's disease	8
				Pulmonary tuberculosis	6
				Heart disease	6
				Influenza	6
65–69	158	69	89	Heart disease	11
				Chronic bronchitis	10
				Pneumonia	9
				Cerebral hemorrhage	8
				Old age	8
				Violent	7
				Broncho-pneumonia	6
				Hernia and intestinal obstruction	6
				Bright's disease	5
				Diarrhœa	5
				Cancer	4

TABLE NO. IX.

Boston Deaths from Certain Specified Causes, 1900 and 1910, with Percentages of Such Deaths Among the Population of Irish Mother Nativity. (Deaths of Nonresidents Deducted.)

Causes of Death.	Total Deaths, 1900.	Deaths and Percentages of Total Deaths from Each Cause for Those Having Mothers Born in Ireland, 1900.	Total Deaths, 1910.	Deaths and Percentages of Total Deaths from Each Cause for Those Having Mothers Born in Ireland, 1910.
All causes	10,880	3,969=36.48%	10,294	3,377=32.81%
Pulmonary tuberculosis (Nos. 28 and 29 of 1909, revision of International Classification of Causes of Death).	1,345	653=49%	1,081	490=45%
Heart disease and nephritis (Nos. 79, 119 and 120 of International Classification).	1,353	554=41%	1,842	717=39%
Broncho-pneumonia and pneumonia (Nos. 91 and 92 of International Classification).	1,154	430=37%	1,287	423=33%
Violent deaths (Nos. 155–186)	470	156=33%	591	190=32%
Cancer (Nos. 39–45)	430	151=35%	580	212=37%
Cerebral hemorrhage (No. 64)	424	167=39%	523	195=37%
Chronic bronchitis (No. 90)	115	79=69%	34	17=50%
Alcoholism (No. 56)	68	44=65%	128	60=47%

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF MAY, 1912.

Boston had 913 deaths in May, compared with 1,054 for May of last year, and a death rate of 14.93 against 18.01 for May, 1911.

Deaths from reportable diseases were much fewer than a year ago. The principal decreases were tuberculosis (all forms), 17; whooping cough, 13; scarlet fever, 6; measles, 5; diphtheria, 4; and typhoid fever, 2.

Other important differences were as follows:

May, 1912, Decreases:	
Pneumonia	25
Suicides	7
Other violent deaths	21
Cancer	10
Meningitis	8
Diarrhea and enteritis (under 2 years)	7
May, 1912, Increases:	
Heart disease and nephritis	23
Congenital debility and malformations	10
Apoplexy	10
Puerperal septicemia	3

There were 2 less deaths under 1 year than in May, 1911, and 43 less under 5 years.

Ward 11 had the lowest rate, 6.74, and Ward 12 the highest, 21.30. Deaths of nonresidents were 100 against 113 in May, 1911.

Compared with May, 1911, there were fewer cases of diphtheria, measles and scarlet fever, but more cases of varicella and typhoid fever. Most of the typhoid cases in Wards 1 and 2 were probably due to the infection of a small part of a dealer's milk.

There were 179 deaths under 1 year, which is 2 less than the average for the corresponding month for the preceding five years.

Eighty-four of these deaths were due to premature birth, congenital debility, malformations, and other diseases peculiar

to early infancy; 37 to bronchitis and pneumonia; 21 to diarrhea and enteritis; 16 to reportable diseases; and 21 to other causes.

Of these deaths under 1 year, Ward 20 furnished the largest number, 20, and Ward 6 came next with 19. One hundred and fifteen were over 2 weeks old, 76 over 3 months, and 20 over 9 months.

Of the 115 over 2 weeks old 74 were bottle fed.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
* Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	13 .06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	‡298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston January 1, 1912, and became Ward 26. Under "Boston," in the above table, Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau.

‡ An infant asylum is located in this ward.

May. General Summary.

	1912.	1911.
Total deaths, May	913	1,054
Population, estimated*	720,031	688,912
Death rate per 1,000	14.93	18.01
Deaths of nonresidents	100	113
Corrected death rate†	13.29	16.08

*Population estimated by arithmetical method used by Census Bureau.
†Nonresidents not included.

May, 1912. Statement of Deaths.

Total number (stillbirths excluded)	913
Sex.	
Males	465
Females	448
Condition.	
Single	434
Married	265
Widowed	199
Divorced	6
Unknown	9
Color.	
White	881
Black (negro or mixed)	29
Chinese	3
Deaths of children:	
Under one year	179
Under two years	220
Under five years	250
Stillbirths during the month,	70

Nativity.	
United States	577
Ireland	133
England and Wales	22
Scotland	9
Germany	17
Canada	68
Italy	17
Russia and Poland	24
Sweden and Norway	6
France	2
Other countries	20
Unknown	18
Nativity of Mothers.	
United States	265
Ireland	274
England and Wales	29
Scotland	12
Germany	24
Canada	82
Italy	69
Russia and Poland	44
Sweden and Norway	11
France	3
Other countries	23
Unknown	77

Abridged List Class Number.	Causes of Death.	Totals. May, 1912.	Totals. May, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes {1912	913	.....	179	41	18	6	6	250	14	10	26
	{1911	.....	1,054	181	66	18	16	12	293	21	10	25
1	Typhoid fever	1	3	.....	.....	.....	.....	.....	.....	1	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	8	13	3	2	1	2	.....	8	.....	.....	.....
6	Scarlet fever	3	9	.....	1	.....	1	1	.....	.....	.....	.....
7	Whooping cough	5	18	3	2	.....	.....	.....	.....	.....	.....	.....
8	Diphtheria and croup	6	10	1	2	2	.....	.....	5	1	.....	.....
9	Influenza	.....	7	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	8	11	4	.....	.....	.....	.....	4	.....	.....	.....
13	Tuberculosis of the lungs	78	90	3	1	1	.....	1	6	.....	1	7
14	Tuberculous meningitis	10	15	3	4	.....	.....	.....	7	1	.....	2
15	Other forms of tuberculosis	7	5	2	1	1	.....	.....	4	.....	.....	.....
16	Cancer, malignant tumor	62	72	.....	.....	.....	.....	.....	.....	.....	.....	1
17	Simple meningitis (except cerebro-spinal meningitis).	5	13	1	.....	1	1	.....	3	1	.....	.....
17a	Cerebro-spinal meningitis	2	1	1	.....	.....	1	.....	2	.....	.....	.....
18	Apoplexy and softening of the brain	46	36	1	.....	.....	.....	.....	1	.....	.....	.....
19	Organic heart diseases	121	95	.....	.....	.....	.....	.....	.....	2	2	6
20	Acute bronchitis	5	6	4	1	.....	.....	.....	5	.....	.....	.....
21	Chronic bronchitis	4	4	.....	1	.....	.....	.....	1	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	75	100	13	5	4	.....	2	24	1	.....	1
22a	Broncho-pneumonia	43	43	20	9	4	.....	.....	33	1	.....	.....
23	Other respiratory diseases	7	7	.....	.....	1	1	1	3	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	6	6	3	.....	.....	.....	.....	3	.....	.....	.....
25	Diarrhea and enteritis (under two years).	24	31	21	3	.....	.....	.....	24	.....	.....	.....
26	Appendicitis and typhlitis	12	12	.....	.....	.....	.....	.....	.....	1	2	2
27	Hernia, intestinal obstruction	7	6	1	.....	.....	.....	.....	1	.....	.....	.....
28	Cirrhosis of liver	7	8	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	63	66	.....	.....	.....	.....	.....	.....	.....	.....	1
30	Diseases of women (not cancer)	8	9	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	4	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	6	8	.....	.....	.....	.....	.....	.....	.....	.....	1
33	Congenital debility and malformations.	66	56	66	.....	.....	.....	.....	66	.....	.....	.....
34	Old age	2	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	50	71	1	4	1	.....	1	7	3	1	3
36	Suicide	12	19	.....	.....	.....	.....	.....	.....	.....	.....	1
37	Other diseases	148	197	27	5	2	.....	.....	34	2	4	1
38	Ill-defined causes	2	2	1	.....	.....	.....	.....	1	.....	.....	.....

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex. Males.	Sex. Females.	Abridged List Class Number.
24	32	29	56	41	50	60	64	65	57	48	43	27	9	8	465	448	
20	40	40	69	62	59	74	61	66	73	48	43	22	20	8	545	509	
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	4	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	6
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	2	7
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	2	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	9
1	.....	.....	1	.....	1	.....	.....	.....	.....	1	.....	.....	.....	.....	6	2	12
7	9	6	13	7	8	5	4	2	3	.....	.....	.....	.....	.....	43	35	13
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	7	3	14
1	.....	.....	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	4	15
.....	.....	.....	2	4	8	9	10	8	4	6	6	3	1	.....	21	41	16
.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	1	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	17a
.....	.....	.....	2	.....	.....	4	2	5	9	8	7	3	3	2	21	25	18
1	3	5	6	4	4	12	12	12	16	9	14	9	.....	4	51	70	19
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	2	20
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	2	.....	.....	2	2	21
2	2	4	6	4	3	1	3	7	5	4	5	.....	1	2	41	34	22
1	.....	.....	.....	.....	1	.....	.....	2	2	.....	1	2	.....	.....	22	21	22a
.....	.....	.....	1	2	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	2	5	23
.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	3	3	24
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	8	16	25
.....	1	1	4	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	8	4	26
1	.....	.....	.....	.....	.....	.....	2	2	.....	.....	1	.....	.....	.....	3	4	27
.....	.....	.....	1	.....	3	.....	.....	1	.....	2	.....	.....	.....	.....	5	2	28
.....	1	1	6	2	4	12	10	5	10	6	3	2	.....	.....	32	31	29
.....	.....	1	1	1	3	1	.....	1	.....	.....	.....	.....	.....	.....	.....	8	30
.....	3	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	31
1	2	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	6	32
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	41	25	33
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	1	.....	1	1	34
2	3	2	6	5	5	7	2	3	.....	1	.....	.....	.....	.....	38	12	35
2	1	.....	1	2	2	.....	1	2	.....	.....	.....	.....	.....	.....	11	1	36
5	7	4	5	8	7	9	17	13	8	11	4	6	3	.....	76	72	37
.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	1	1	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence. 1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	913	27	38	24	20	15	52	26	37	29	27	17
	Rates per 1,000 population { May, 1912	14.93	10.07	14.87	18.15	17.25	13.71	15.97	20.94	13.14	12.05	12.24	6.74
	{ May, 1911	18.01	13.03	14.36	12.18	13.97	9.16	15.84	23.15	16.14	16.71	23.84	16.01
1	Typhoid fever	1	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	8	.....	.....	.....	.....	.....	2	.....	.....	1	.....	.....
6	Scarlet fever	3	.....	.....	.....	1	.....	.....	.....	.....	.....	1	.....
7	Whooping cough	5	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....
8	Diphtheria and croup	6	.....	.....	.....	.....	.....	2	.....	.....	.....	1	.....
9	Influenza	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	8	.....	.....	.....	1	.....	3	1	.....	.....	.....	.....
13	Tuberculosis of the lungs	78	1	4	5	4	1	4	5	3	2	1	1
14	Tuberculous meningitis	10	.....	1	.....	.....	1	2	.....	1	.....	.....	.....
15	Other forms of tuberculosis	7	.....	1	.....	.....	.....	1	.....	.....	.....	.....	.....
16	Cancer, malignant tumor	62	1	3	2	.....	1	1	4	2	5	1	3
17	Simple meningitis (except cerebro-spinal meningitis).	5	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....
17a	Cerebro-spinal meningitis	2	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
18	Apoplexy and softening of the brain.	46	1	.....	1	.....	.....	.....	.....	.....	2	2	1
19	Organic heart diseases	121	3	6	4	5	1	2	2	5	4	6	4
20	Acute bronchitis	5	.....	.....	.....	.....	.....	2	.....	1	.....	.....	.....
21	Chronic bronchitis	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1
22	Pneumonia (except broncho-pneumonia).	75	2	3	2	2	1	7	3	4	1	1	1
22a	Broncho-pneumonia	43	2	3	2	.....	2	6	.....	3	1	.....	1
23	Other respiratory diseases	7	.....	.....	1	1	.....	.....	.....	.....	.....	1	.....
24	Diseases of the stomach (cancer excepted).	6	1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....
25	Diarrhea and enteritis (under two years).	24	1	1	.....	.....	.....	4	.....	.....	.....	.....	.....
26	Appendicitis and typhlitis	12	2	.....	.....	.....	.....	1	.....	1	1	1	.....
27	Hernia, intestinal obstruction	7	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....
28	Cirrhosis of liver	7	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....
29	Bright's disease and nephritis	63	2	1	2	2	2	2	3	2	4	4	2
30	Diseases of women (not cancer)	8	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	4	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	6	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	66	4	6	2	2	1	5	.....	5	1	2	.....
34	Old age	2	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....
35	Violent deaths	50	.....	2	1	.....	1	2	1	2	1	1	.....
36	Suicide	12	.....	.....	.....	.....	.....	.....	1	.....	.....	2	.....
37	Other diseases	148	6	6	2	1	3	4	3	7	5	2	3
38	Ill defined causes	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
	Total deaths under one year	179	8	14	3	4	3	19	3	12	2	2	1

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number.
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
46	26	25	21	28	33	41	37	62	35	33	38	34	19	13	....	100	10	
21.30	14.23	12.15	11.44	12.08	14.20	20.98	13.27	11.79	12.77	12.55	13.74	9.89	7.80	9.60	....	....	....	....
15.59	16.95	12.30	20.87	11.54	18.36	26.24	13.48	20.91	16.08	16.21	7.80	13.50	11.46	....	....	....	....	....
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	4
.....	1	1	.....	.....	1	1	.....	1	.....	.....	.....	.....	.....	.....	....	....	...	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	6
.....	.....	2	.....	.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....	....	....	...	7
.....	2	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	....	....	...	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	9
1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	1	...	12
2	3	3	5	1	1	6	3	4	1	4	2	3	2	1	....	5	1	13
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	2	1	.....	.....	.....	....	1	...	14
1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	....	3	...	15
1	1	1	1	1	3	3	1	4	5	1	2	3	2	.....	....	10	...	16
.....	1	.....	.....	.....	.....	.....	1	1	.....	1	.....	.....	.....	.....	....	....	...	17
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	17a
2	1	.....	3	2	.....	2	5	1	6	2	5	2	1	2	....	5	...	18
7	2	4	4	6	5	6	2	5	6	3	8	3	5	2	....	10	1	19
1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	....	...	20
.....	1	.....	.....	.....	.....	.....	1	.....	.....	1	.....	.....	.....	.....	....	....	...	21
5	1	4	2	.....	2	4	3	7	2	2	4	3	.....	1	....	8	...	22
2	2	1	.....	1	2	2	1	4	.....	3	1	2	.....	1	....	1	...	22a
.....	1	1	1	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	....	....	...	23
.....	.....	.....	1	.....	.....	.....	1	.....	.....	.....	1	1	.....	.....	....	....	...	24
1	.....	1	.....	1	.....	2	1	6	.....	2	.....	1	1	.....	....	2	...	25
2	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	....	2	...	26
.....	.....	.....	.....	.....	1	.....	.....	1	.....	1	.....	.....	2	.....	....	1	...	27
1	.....	.....	.....	.....	1	.....	1	.....	.....	1	.....	2	.....	.....	....	....	...	28
4	.....	2	.....	2	4	2	2	4	2	1	4	2	.....	2	....	5	1	29
1	.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....	1	....	3	...	30
.....	.....	.....	.....	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	1	...	31
1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	....	2	...	32
6	2	.....	1	4	1	2	2	6	2	3	2	.....	2	.....	....	5	...	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	...	34
2	1	1	.....	3	3	4	3	2	.....	1	.....	1	2	1	....	10	5	35
1	.....	.....	.....	.....	.....	1	.....	1	3	.....	.....	2	.....	.....	.....	1	...	36
5	5	4	3	6	8	4	5	13	7	5	6	8	2	1	....	23	1	37
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	38
11	6	2	2	6	3	7	8	20	3	7	6	7	4	1	....	14	1	

VITAL STATISTICS.

May Infant Mortality.

Detailed List Class Number.	Causes of Death.	May Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	179	181	35	8	3	15	3	6	6	16	11	26	30	20	41	74	14
	Male	101	96	22	4	3	10	1	2	4	11	6	16	14	8	23	38	8
	Female	78	85	13	4	...	5	2	4	2	5	5	10	16	12	18	36	6
	White	174	177	33	8	3	15	3	6	6	16	11	25	29	19	41	71	14
	Colored	5	4	2	...	...	...	...	...	...	...	...	1	1	1	.....	3	...
1	Typhoid fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
5	Smallpox	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
6	Measles	3	4	...	...	...	...	...	...	...	...	...	...	1	2	2	1	...
7	Scarlet fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
8	Whooping cough	3	7	...	...	...	...	...	...	...	...	...	1	...	2	1	2	...
9	Diphtheria and croup	1	5	...	...	...	...	...	...	...	...	...	...	1	...	.....	1	...
10	Influenza	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
14	Dysentery	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
18	Erysipelas	4	2	...	...	...	...	...	...	...	1	...	3	...	...	3	1	1
19	Other epidemic diseases	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
20	Pus-infection and septicemia,	1	1	...	...	...	...	...	...	...	1	...	...	...	...	1	.....	...
24	Tetanus	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
28	Tuberculosis of the lungs	3	.....	...	...	...	...	...	...	...	...	...	1	2	...	.....	3	...
29	Acute miliary tuberculosis	.....	2	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
30	Tuberculous meningitis	3	4	...	...	...	...	...	...	...	...	...	...	2	1	1	2	1
31 35	Other forms of tuberculosis	2	.....	...	...	...	...	...	...	...	...	...	...	1	1	.....	2	1
36	Rickets	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
37	Syphilis	4	1	1	...	...	...	...	...	1	...	...	1	1	...	1	2	...
38	Gonococcus infection	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
61	Simple meningitis	1	4	...	...	...	...	...	...	...	...	...	...	1	...	.....	1	...
61a	Cerebro-spinal fever	1	.....	...	...	...	...	...	...	...	...	...	...	1	...	1	.....	...
63a	Acute poliomyelitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
71	Convulsions	.....	2	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
76	Diseases of the ears	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
79	Organic diseases of the heart,	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
89	Acute bronchitis	4	2	...	...	...	...	...	...	...	...	1	1	2	...	3	1	...
91	Broncho-pneumonia	20	15	...	...	...	...	...	...	1	2	3	2	8	4	8	12	1
92	Pneumonia	13	17	...	...	...	1	...	1	...	...	...	3	4	4	6	6	...
93	Pleurisy	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
103	Other diseases of stomach	3	1	...	...	...	...	...	...	...	...	...	...	1	2	1	2	...

VITAL STATISTICS.

May Infant Mortality.—*Concluded.*

Detailed List Class Number.	Causes of Death.	May Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
104	Diarrhea and enteritis	21	28	...	...	...	...	...	1	...	5	3	7	3	2	4	17	2
108	Appendicitis and typhlitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
109	Hernias, intestinal obstruction,	1	3	...	...	...	...	...	...	...	...	...	1	...	...	1	...	...
117	Simple peritonitis	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
119	Acute nephritis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
143	Furuncle	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
144	Acute abscess	1	1	...	...	...	...	...	...	...	...	...	1	...	...	...	1	...
145	Other diseases of skin, etc.	1	3	...	...	...	...	...	...	...	...	...	...	1	...	...	1	1
150*a*	Hydrocephalus	1	...	...	...	...	...	...	...	...	1	...	...	...	...	1	...	...
b	Congenital malformations of heart.	4	12	2	1	...	...	...	...	...	...	...	...	1	...	...	1	1
c	Other malformations	4	...	...	1	...	...	...	1	1	1	...	...	...	...	1	2	...
151*a*	Premature birth	42	...	21	5	1	5	1	...	3	4	2	...	...	...	4	5	2
b	Congenital debility	15	43	1	1	...	2	...	2	...	1	2	4	...	2	2	9	2
152*a*	Injuries at birth	6	...	3	...	2	1	...	...	...	...	...	...	...	...	...	...	1
b	Other causes peculiar to early infancy.	12	14	5	...	...	4	2	1	...	...	...	...	...	...	...	1	...
167	Burns (conflagrations excepted).	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
168	Absorption of deleterious gases,	1	...	...	...	...	1	...	...	...	...	...	...	...	...	...	...	...
172	Traumatism by fall	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
182, 184	Homicide	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
187, 189	Ill-defined diseases	1	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Other causes	3	8	1	...	...	1	...	...	...	...	...	1	...	...	...	1	1
	Breast fed *	41	34	...	...	...	...	...	1	2	9	2	11	8	8	41	...	2
	Bottle fed *	73	85	...	...	...	...	...	5	4	7	9	15	22	12	...	74	8
	Nonresidents	14	8	4	...	...	...	...	1	...	...	1	5	2	1	2	8	14

* Aged two weeks and over.

Additional Deaths for Other Months.

March, 1912,—1 male; premature birth; white; under one day; residence unknown; born United States; mother nativity, Canada.

1 male; premature birth; white; aged 3 days; residence, Wd. 12; born in United States; mother nativity, United States.

April, 1912.—1 female; premature birth; white; under one day; residence, Ward 12; born in United States; mother nativity, United States.

1 male; accidental drowning; white; unknown condition; aged 35; residence unknown; birthplace unknown; mother nativity, unknown.

MORBIDITY STATISTICS.

May, 1912. **Cases Reported.**

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum.
1	1	....	....	....	....	1	....	....	....	....	78	1	4
2	....	....	....	....	....	8	....	....	1	....	22	....	5
3	....	....	....	....	....	2	....	....	....	....	8	....	2
4	....	....	....	....	1	3	....	....	....	....	5	....	....
5	....	....	....	....	....	....	....	....	....	....	11	3	2
6	1	....	....	....	1	10	....	....	....	....	57	1	7
7	....	....	....	....	....	4	....	....	....	....	14	1	4
8	....	....	....	....	....	8	....	....	....	....	21	....	33
9	....	....	....	....	....	4	....	....	1	....	78	2	10
10	....	....	....	....	....	2	....	....	....	....	7	....	....
11	....	....	....	....	....	2	....	....	....	....	8	....	3
12	....	....	....	....	....	6	....	....	1	....	42	1	....
13	....	....	....	....	1	5	....	....	....	....	39	4	4
14	....	....	....	....	1	2	....	....	....	....	36	....	1
15	....	....	....	....	....	....	....	....	....	....	25	1	4
16	....	....	....	....	....	12	....	1	....	....	17	....	2
17	....	....	....	....	1	6	....	....	....	....	11	1	1
18	....	....	....	....	....	5	....	....	....	....	30	2	6
19	....	....	....	....	....	7	....	....	....	....	73	5	2
20	1	....	....	....	....	6	....	....	....	....	34	....	10
21	....	....	....	....	....	17	....	....	....	....	29	....	1
22	....	....	....	....	....	6	....	....	....	....	23	1	1
23	....	....	....	....	....	8	....	....	....	....	9	1	....
24	....	....	....	....	....	....	....	....	....	....	14	4	2
25	....	....	....	....	....	5	....	....	....	....	12	....	....
26	....	....	....	....	....	....	....	....	....	....	11	1	....
Total	3	....	....	....	5	129	....	1	3	....	714	29	104
Unknown	....	....	....	....	....	1	....	....	....	....	3	....	....
Nonresidents	....	....	....	....	....	4	....	....	....	....	4	....	7
Grand total	3	....	....	....	5	134	....	1	3	....	721	29	111
Corresponding month last year.	2	1	....	....	4	189	1	2	1	....	889	36	94

MORBIDITY STATISTICS.

Cases Reported. **May, 1912.**

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
7	2	....	....	....	9	1	11	....	5	1	....	1
6	....	....	....	....	13	1	6	....	18	12	....	2
3	....	....	....	....	6	....	1	....	.....	.....	....	3
3	....	....	....	....	5	....	3	....	.....	1	....	4
2	....	....	....	....	5	1	....	....	1	.....	....	5
5	....	....	....	....	29	5	8	....	12	10	....	6
2	....	....	....	....	23	1	2	....	1	1	....	7
6	....	....	....	....	18	4	....	....	4	3	....	8
5	....	....	....	....	15	....	....	....	14	4	....	9
2	....	....	....	....	8	1	1	....	2	.....	....	10
.....	....	....	....	....	5	....	....	....	3	2	....	11
5	....	....	....	....	15	1	....	....	1	....	....	12
3	....	....	....	....	17	1	1	....	13	.....	....	13
3	....	....	....	....	4	....	....	....	3	7	....	14
4	....	....	....	....	10	....	1	....	4	2	....	15
4	....	....	....	....	7	....	1	....	16	1	....	16
4	....	....	....	....	15	....	1	....	11	3	....	17
.....	....	....	....	....	19	....	1	....	3	2	....	18
5	....	....	....	....	14	....	2	....	16	6	....	19
8	....	....	....	....	16	1	....	....	26	2	....	20
4	....	....	....	....	9	....	....	....	3	1	....	21
4	....	....	....	....	10	6	1	....	4	5	....	22
1	....	....	....	....	6	1	....	....	.....	4	....	23
9	....	....	....	....	9	1	1	....	13	9	....	24
4	....	....	....	....	4	....	1	....	4	3	....	25
3	....	....	....	....	9	....	....	....	15	1	....	26
102	2	....	....	....	300	25	42	....	192	80	....	Total
.....	....	....	....	....	3	....	....	....	2	.....	....	Unknown
16	....	....	4	....	18	4	....	....	.....	.....	....	Nonresidents
118	2	....	4	....	321	29	42	....	194	80	....	Grand total
170	....	3	.....	....	328	....	27	....	112	78	....	Corresponding month last year.

DIVISION OF CHILD HYGIENE.— MAY, 1912.

1. Medical Inspection of Schools.

Number inspections made	20,367
Number physical examinations made	8,250

There were 2,149 children excluded from school during the month, ill with contagious disease, as follows:

Diphtheria	3	Trachoma	1
Scarlet fever	5	Acute or purulent conjunctivitis	79
Measles	22	Ringworm	41
German measles	12	Scabies	38
Chicken pox	76	Impetigo	40
Whooping cough	12	Favus	3
Mumps	16	Molluscum contagiosum	1
Acute tonsilitis	91	Erysipelas	2
Influenza	3	Miscellaneous	446
Pediculosis	1,258		

There were 16,828 cases of noncontagious disease found, subdivided as follows:

Diseases of oral and respiratory tract	3,738
Diseases of eye	722
Diseases of ear	146
Diseases of skin	1,305
Dental caries	3,472
Miscellaneous	7,445

2. Physical Examination of Licensed Minors.

There were 350 children between the ages of 14 and 16 examined during this month. 131 were found without defects and 228 with defects as follows:

Throat	26	Heart	6
Hearing	1	Skin	13
Sight	43	Miscellaneous	5
Mouth and lips	198		

3. Pre-Natal and Post-Natal Work.

Pre-Natal.

Number cases	1	Number visits	1

Post-Natal.

Number cases	883	Bottle-fed babies	167
Number visits	895	Both feedings	127
Breast-fed babies	589		

Defective Conditions Noted.

Cervical glands	1	Otitis media	2
Improper feeding	5	Skin disease	4
Orthopedic defects	1	Umbilical hernia	2

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:		
Positive for diagnosis	92	
Positive for release	84	
Negative for diagnosis	853	
Negative for release	175	
"No growth" cultures	23	1,227
TUBERCULOSIS:		
Positive	105	
Negative	497	
Unsatisfactory	0	602
TYPHOID:		
Positive	28	
Negative	130	
Atypical	9	
Unsatisfactory	1	168

GLANDERS:	Strauss.	C.	F.	Ag.	
Positive	7	12	11	30	
Negative	10	9	8	27	
Unsatisfactory	1	0	0	1	
Atypical	0	0	1	1	59

GONORRHEA:		
Positive	23	
Negative	86	
Unsatisfactory	0	109
GONORRHOEAL OPHTHALMIA:		
Positive	1	
Negative	59	
Unsatisfactory	0	60
OTHER EXAMINATIONS:		
*Positive	15	
Negative	30	
Unsatisfactory	0	45
BACTERIOLOGICAL MILK EXAMINATIONS	818	818
Cultures for streptococci	796	796
Bacteriological examination of ice cream	2	2
Total	3,886	3,886

SPECIAL WORK:
Longevity of tubercle bacilli in sputum.
Cultural tests of streptococci.

* Meningitis, pneumococci, Organisms, K-L Vir. conradi, Ty. urine and feces, malaria, G-U. T. B.

INSPECTION OF MILK, VINEGAR, ETC.

Examination as to Statute Requirements.

Samples examined, milk from stores	589
" " milk from wagons	688
" " milk brought in by citizens	60
" " milk for bacteriological examination	818
" " vinegar	70
" " butter and cheese	127
Total samples	2,352

INSPECTION OF DAIRIES.

Satisfactory * on first inspection	192	
Satisfactory on later inspection	537	
		729
Unsatisfactory on first inspection	276	
Unsatisfactory on later inspection	22	
		298
Total number of inspections		1,027
Dairies having milk rooms	401	
Dairies without milk rooms	626	
Number of cattle inspected	12,261	
Number of dairies prohibited shipping milk to Boston because of insanitary conditions of premises	29	

* "Satisfactory" means having a score of at least 45 per cent by the government score card.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	362	Cattle condemned (5 and parts),	3,215 lbs.
Calves inspected	449	Calves condemned (1)	38 lbs.
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	5,101	Swine condemned (7 and parts),	3,277 lbs.

INSPECTION OF PROVISIONS.—ARTICLES CONDEMNED.

Meats.		Miscellaneous.	
Veal (tainted)	14 lbs.	Lobster (dead)	65 lbs.
Beef (tainted)	207 lbs.	Potatoes (decayed)	920 bush.
Pork (tainted)	39 lbs.	Onions (decayed)	16 bush.
Poultry (tainted)	1,763 lbs.		

SANITARY INSPECTION DIVISION.

New reports	2,195
Reinspections	4,249
New tenement house reports	165
Nuisances reported	4,065
Legal notices	338
Court cases	7
Fines	$113
Tenements vacated	4
Milk applications approved	140
Stable permits granted	2
Stable hearings	2
Dump permits	8

QUARANTINE.

Vessels inspected at quarantine	82
Total immigrants arriving in Boston	6,510

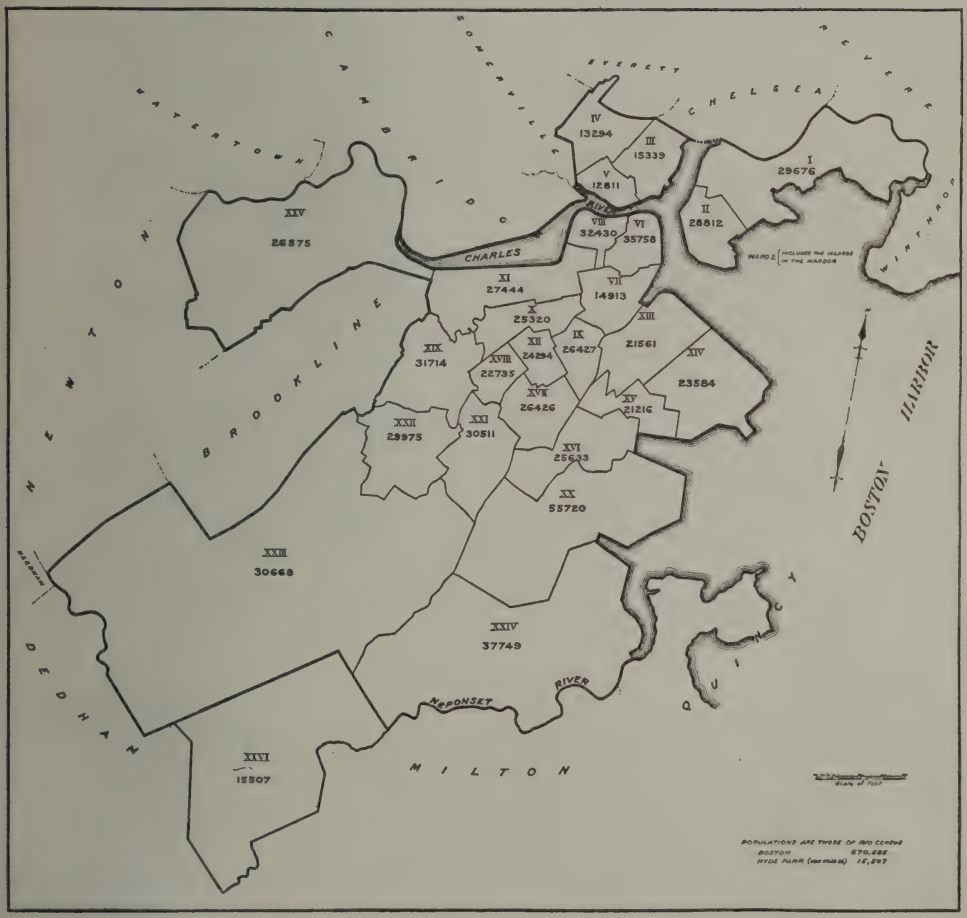
MONTHLY METEOROLOGICAL SUMMARY.

Taken at Weather Bureau, Boston, May, 1912.

Day.	Temperature, Degrees Fahrenheit.			Relative Humidity.	Daily Precipitation.	Actual Hours Sunshine.	Wind.		
	Maximum.	Minimum.	Mean.				Average Hourly Velocity. (Miles.)	Maximum Velocity. (Miles.)	Prevailing Direction.
1.....	73	42	58	48	—	12.7	5.9	15	W.
2.....	60	48	54	45	—	11.6	7.1	15	W., N. E.
3.....	62	47	54	35	—	14.1	8.7	22	N.
4.....	58	45	52	45	—	14.2	8.4	17	S. E.
5.....	58	42	50	68	—	11.8	8.8	17	S. W.
6.....	49	44	46	91	.44	—	8.8	18	S. E.
7.....	53	43	48	92	—	5.4	8.6	13	E.
8.....	47	43	45	100	.62	—	13.9	24	E.
9.....	66	46	56	84	.16	7.1	9.4	20	N. W.
10.....	68	49	58	68	.29	3.1	10.7	22	W.
11.....	76	52	64	42	—	14.2	9.4	18	S. W.
12	71	54	62	71	.03	9.5	14.2	28	S.
13.....	70	55	62	93	.10	4.7	15.8	25	S.
14.....	69	44	56	52	—	13.3	15.8	33	W.
15.....	65	51	58	52	—	6.6	6.1	13	S. W.
16.....	57	48	52	96	.72	—	9.1	23	N. E.
17.....	75	53	64	72	—	10.3	13.1	35	S. W.
18.....	77	55	66	40	—	14.7	12.5	19	W.
19.....	80	57	68	48	—	13.0	14.0	29	W.
20.....	57	47	52	66	T	6.9	12.0	22	E.
21.....	55	44	50	84	.31	10.0	8.4	19	E.
22.....	59	49	54	74	—	12.6	8.1	14	E.
23.....	74	50	62	78	—	7.9	10.7	22	S. W.
24.....	86	62	74	79	.19	12.2	15.0	27	S. W.
25.....	68	57	62	63	—	14.5	10.9	21	W., S. W.
26.....	72	56	64	60	.48	12.5	8.9	24	W.
27.....	82	56	69	52	—	14.8	9.3	17	W.
28.....	82	60	71	40	—	14.9	18.7	33	S. W.
29.....	76	66	71	83	T	8.7	16.2	26	S. W.
30.....	68	51	60	98	.15	—	7.7	14	N. E.
31.....	56	51	54	80	.55	0.1	10.9	19	W.
Totals.....	—	—	—	—	4.04	281.4	—	—	—
Means.....	66.7	50.5	58.6	67.7	0.13	—	10.9	—	S. W.

Latitude 42 degrees 21 minutes. Longitude 71 degrees 4 minutes.

BOSTON WARD MAP.



Vol. 1 JUNE, 1912 No. 6

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF THE

CITY OF BOSTON

	Page
Pasteurization	151
Regulation Respecting Communicable Diseases	155
Vital Statistics, June, 1912	157
Monthly reports	166

CITY OF BOSTON
PRINTING DEPARTMENT
1912

ORGANIZATION OF THE HEALTH DEPARTMENT.

SAMUEL H. DURGIN, M. D., *Chairman.*
FRANCIS X. MAHONEY, M. D.
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

ELLIS D. HAINES CO. TRADES UNION LABEL COUNCIL BOSTON MASS.

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, JUNE, 1912. NO. 6.

PASTEURIZATION.

BY P. H. MULLOWNEY, M. D. V.
Health Commissioner, City of Boston.

An effort will be made in this paper to discuss in a brief manner certain phases of the commercial pasteurization of milk and the effect on the nutrition of infants of feeding pasteurized milk.

Reports received from dairy inspectors of this department, stationed in the receiving plants of milk contractors in Boston, show that about 70 per cent of all market milk sold in Boston is subjected to one or more heating processes before sale. Of this 70 per cent about 5 per cent is perfectly pasteurized by a process approved by the Boston Board of Health. In this process there is no possibility of human handling of the milk from the time it is ready for pasteurization until such time as the cap is removed from the bottle by the hands of the consumer. Of the remaining percentage of milk, which is heated, about 50 per cent is processed in such a manner that the danger of infection is very slight, but the possibility of contamination always is present. The remaining 15 per cent of this processed milk is handled in such an insanitary manner that there is always a very great danger of contamination.

From a health point of view, ideal pasteurization would be that in the final container, the milk being subjected to a temperature of 145 degrees Fahrenheit for twenty-five minutes, the container being capped before processing. Large milk contractors in this city maintain that it would be practically impossible to pasteurize all their milk in the final container, as it would require ten times the amount of space at present occupied and would entail an additional yearly expense of $300,000, that the price of a quart of milk to consumer would be increased

two cents over the present price. Another method of pasteurization is in bulk form, milk being held in a holding device for at least twenty-five minutes at a temperature of 145 degrees Fahrenheit, at the end of this time being cooled immediately to a temperature below 50 degrees Fahrenheit, then bottled and capped by mechanical means.

When dairy inspection was first undertaken by this department it was found that nearly all the large contractors were heating milk at stations in the country using the flash method of pasteurization, this being done solely to hide the dirt in the milk and to keep it for an extended period. All this milk was again subjected to a heating process when it reached this city. This practice of double pasteurization was abandoned by all contractors, with one exception, who, up to the present time, continues this reprehensible practice.

There have been no outbreaks of communicable diseases traceable to milk for the past two years in Boston. In the outbreaks of septic sore throats in May, 1911, and February, 1912, the milk though strongly suspected was never thoroughly inculpated. This freedom of market milk from infection for the last two years may be attributed to several reasons. Pasteurization may have been the strongest factor to bring about this condition, though it should be pointed out that a typhoid carrier, for instance, engaged in capping and handling pasteurized milk at the contractors' plant could easily infect the milk and a false security thereby exist. An examination of the throats and hands of the employees at the different milk stations where milk is pasteurized disclosed the fact that nearly every one of these employees had throat infection of varying degree, and several of the employees handling the milk had cuts and sores on their fingers, one employee having a paronychia of the hand. As this man put the paper caps on the bottles it is easy to see how the milk could be contaminated.

Another great factor that makes for the freedom of market milk from infection, in Boston, is the excellent work being done by inspectors of the Dairy Division in improving conditions at the source of supply and handling and transportation of the milk to Boston. The condition under which every cow is kept whose milk is sold in Boston has been investigated by inspectors of the Dairy Division of this department, and only milk produced from healthy cows and handled and transported in a clean manner has been allowed to be sold in Boston.

Another factor is the action of the commissioners in excluding all milk from the Boston market produced on a farm where a case

of communicable disease exists, and not allowing the resumption of the sale of this milk until upon investigation by its own agents, the department is thoroughly satisfied that no danger exists. In the outbreak of septic sore throats in May, 1911, and February, 1912, several of these throats were encountered on pasteurized milk supplies and investigation of the handling and processing of this milk readily disclosed how easily milk could be the carrier. At three of these milk stations it was discovered that the bottled pasteurized milk was frequently subjected to human handling by abstracting and adding milk to the bottles to bring the contents up to a quart measure. It was also found that invariably cream was added to milk of low standard to bring it up to the legal standard. This practice of "making" milk obtains at all the contractors' receiving stations in Boston, and while it may be of little importance from a sanitary point of view it enables the contractor to bring a low grade milk hauled from a long distance, and by the addition of solids or fats bring this milk into competition with high grade milk produced near Boston. One contractor in times of shortage extends his condensed milk product into market milk, and as yet there is no legal redress that can be obtained.

It is the opinion of the writer that no milk should be pasteurized for sale in Boston unless each step in the process is watched by an inspector of this department. To carry out this plan in detail inspectors are being placed in the different receiving plants in Boston, whose duty it will be to maintain close supervision over this work during the day and night.

Pasteurization, no matter how perfectly performed, will never make milk that is loaded with cow dung, barn dust or other extraneous matter more sweet and palatable. It has been the practice of some of the contractors to use pasteurization as a cloak to hide dirty, sour milk rather than to use it legitimately to make milk of a doubtful quality safe.

The Effect of Pasteurization of Milk on the Nutrition of Infants.

During the past month an effort was made to obtain the opinion of the leading pediatricians in Boston as to the effect of pasteurized milk on the nutrition of infants. Each one stated that in his opinion the pasteurization of the milk totally eliminated all danger of diarrhœal and intestinal trouble. All but one said that no bad effects, such as scurvy or rickets,

followed. One respondent said, "Personally, I believe that pasteurization by itself has no deleterious effects upon the milk unless the temperature is raised to 212 degrees Fahrenheit, or thereabout. In such cases the prolonged use of the milk may produce scurvy, unless orange juice or its equivalent as a prevention is given. If such a precaution is taken boiled milk may be given indefinitely with no bad effects, providing the milk is adapted to the needs of the individual child"; while another stated that "My feeling is that babies fed continuously on pasteurized milk do not thrive quite as well and are rather more likely to become anaemic and to develop scurvy than those fed continuously on raw milk. I have, however, absolutely no proof that this is the case. It is merely an impression. There is, however, no question that the pasteurization of milk does diminish the number of bacteria, and thus prevent the development of diarrhoeal diseases." A third pediatrician states "would say that my observation has led me to the conclusion that while in some cases babies will do well on such (pasteurized) milk, there will always be found a considerable number who will not thrive on pasteurized milk, but who show a rapid gain in weight if given the same milk unpasteurized."

(Excerpt from another letter.) "There is no doubt that pasteurization does prevent the very great danger to infants from impure milk supplies in which the milk may be contaminated with various bacteria, but in my experience it is better to use a milk which has not been pasteurized, provided that the source of the milk is one in which the very best conditions of production and transportation can be assured. In my opinion there is no doubt that in certain cases the prolonged use of pasteurized milk in infants can produce certain disturbances of nutrition, the cause of which can be traced to no other reason than the use of pasteurized milk. I believe, however, that the dangers from pasteurized milk are slight in comparison with those from unpasteurized milk of doubtful origin, or where there is a possibility of contamination.

"In my practice in the feeding of infants, I am accustomed to use unpasteurized milk in all cases where I can obtain certified milk, or where I can use a milk which I know all about, so far that I can be assured that every care is taken to prevent contamination. Whenever I am in doubt about the source of my milk supply, or in the summer months when the milk has to be transported to any considerable distance before delivery, I have it pasteurized."

The experience of the Child Hygiene Division in the reduction of infant mortality shows that with the use of pasteurized milk diarrhoeal and intestinal diseases of children are almost totally eliminated. However, babies fed on pasteurized milk do not seem to thrive as well as those fed on the raw milk, and anaemia is more often met with in the babies fed on pasteurized milk. As regards scorbutus and rickets this department has no statistics.

COMMUNICABLE DISEASES.

City of Boston, Health Department, June 3, 1912.

In meeting of the Board of Health held this day, it was voted that the regulation respecting contagious diseases adopted July 1, 1895, amended March 10, 1897, and again amended December 24, 1900, be amended to read as follows:

1. Whoever is infected with smallpox, scarlet fever, diphtheria, measles, typhoid fever, varicella, cerebro-spinal meningitis, anterior poliomyelitis or any other disease dangerous to the public health, shall immediately proceed to some isolated place or room designated by the Board of Health, and no person who has been so affected shall leave such place or room, and no article shall be removed from such place or room until the Board of Health shall certify in writing that all danger of communicating such disease to others is passed.

2. Every parent or guardian of any child or ward infected with smallpox, scarlet fever, diphtheria, measles, typhoid fever, varicella, cerebro-spinal meningitis, anterior poliomyelitis or other disease dangerous to the public health, shall immediately cause such child or ward to be conveyed to some isolated place or room approved by the Board of Health, and no parent or guardian shall permit such child or ward to remove from such place or room until the Board of Health shall find and certify in writing that all danger of communicating such disease to others has passed.

3. No person other than the attending physician, nurse, and agents of the Board of Health, shall enter, nor shall any dog, cat, or other animal be allowed to enter any apartment or other place set apart for the treatment of smallpox, scarlet fever, diphtheria, measles, typhoid fever, varicella, cerebro-spinal meningitis, anterior poliomyelitis or any other disease

dangerous to the public health, until the Board of Health shall certify in writing that such apartment or place has been satisfactorily disinfected.

4. No person having the care of any other person who has been infected with smallpox, scarlet fever, diphtheria, measles, typhoid fever varicella, cerebro-spinal meningitis, anterior poliomyelitis or any other disease dangerous to the public health, shall advise or permit such other person to leave any place designated by the Board of Health as a place of isolation of such infected person before said Board of Health shall have certified in writing that such person can leave such designated place without danger to others.

5. No physician who has been in attendance upon any person who has been infected with smallpox, scarlet fever, diphtheria, measles, typhoid fever, varicella, cerebro-spinal meningitis, anterior poliomyelitis or any other disease dangerous to the public health, shall advise or knowingly permit such person to leave any place designated by the Board of Health as a place of isolation of such infected person before said Board of Health shall have certified in writing that such infected person can leave such place without danger to others.

F. H. Slack, *Secretary.*

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF JUNE, 1912.

Boston had 793 deaths in June, compared with 789 for June of last year, and a death rate of 13.40 against 13.93 for June, 1911.

Of deaths from reportable diseases the principal decreases were whooping cough, 6; scarlet fever, 4; and measles, 4; and the principal increases were tuberculosis (all forms), 18; and typhoid fever, 5.

Other important differences were as follows:

June, 1912, Decreases:	
Apoplexy	12
Broncho-pneumonia	8
June, 1912, Increases:	
Heart disease and nephritis	16
Diarrhea and enteritis (under 2 years)	5

There were 4 more deaths under 1 year than in June, 1911, and 26 less over 60 years of age.

Ward 11 had the lowest rate, 4.91, and Ward 7 the highest, 17.48. Deaths of nonresidents were 100 against 80 in June, 1911.

Only 93 cases of diphtheria were reported against 222 in June, 1911; 61 cases of scarlet fever were reported against 113 in June, 1911; and 46 cases of whooping cough were reported against 78 in June, 1911.

On the other hand, there were 605 cases of measles against 489 in June, 1911, and 56 cases of typhoid fever against 39 for the corresponding month of last year.

There were 133 deaths under 1 year, which is 10 less than the average for June for the preceding five years.

Fifty-two of these deaths were due to premature birth, congenital debility, malformations, and other diseases peculiar to early infancy; 29 to diarrhea and enteritis; 20 to bronchitis and pneumonia; 10 to reportable diseases; and 22 to other causes. Of these deaths under 1 year, Ward 20 furnished the largest number, 21, and Ward 6 came next with 10. Eighty-one were over 2 weeks old, and of these 55 were bottle fed.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
* Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	137.06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	‡298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston January 1, 1912, and became Ward 26. Under "Boston," in the above table, Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau.

‡ An infant asylum is located in this ward.

June. General Summary.

	1912.	1911.
Total deaths, June	793	789
Population, estimated*	720,031	688,912
Death rate per 1,000	13.40	13.93
Deaths of nonresidents	100	80
Corrected death rate†	11.71	12.52

* Population estimated by arithmetical method used by Census Bureau.
† Nonresidents not included.

June, 1912. Statement of Deaths.

Total number (stillbirths excluded)	793
Sex.	
Males	424
Females	369
Condition.	
Single	378
Married	273
Widowed	133
Divorced	2
Unknown	7
Color.	
White	767
Black (negro or mixed)	22
Chinese	3
Unknown	1
Deaths of children:	
Under one year	133
Under two years	162
Under five years	191
Stillbirths during the month,	61

Nativity.	
United States	477
Ireland	118
England and Wales	18
Scotland	12
Germany	18
Canada	53
Italy	34
Russia and Poland	28
Sweden and Norway	7
France	—
Other countries	19
Unknown	9
Nativity of Mothers.	
United States	200
Ireland	231
England and Wales	26
Scotland	16
Germany	21
Canada	71
Italy	75
Russia and Poland	52
Sweden and Norway	13
France	3
Other countries	23
Unknown	62

Abridged List Class Number.	Causes of Death.	Totals. June, 1912.	Totals. June, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes	1912 787	.....	133	29	20	1	8	191	18	10	17
		1911	789	129	30	21	9	7	196	14	12	22
1	Typhoid fever	8	3	.....	.....	.....	.....	.....	.....	2	1	.....
3	Malarial fever	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	9	13	3	4	2	.....	.....	9	.....	.....	.....
6	Scarlet fever	1	5	.....	1	.....	.....	.....	1	.....	.....	.....
7	Whooping cough	1	7	1	.....	.....	.....	.....	1	.....	.....	.....
8	Diphtheria and croup	7	6	1	1	1	.....	1	4	3	.....	.....
9	Influenza	2	1	.....	1	.....	.....	.....	1	.....	.....	.....
12	Other epidemic diseases	6	3	3	.....	.....	.....	.....	3	.....	.....	.....
13	Tuberculosis of the lungs	99	84	3	2	.....	.....	.....	5	1	1	10
14	Tuberculous meningitis	12	13	2	2	3	.....	.....	7	2	.....	1
15	Other forms of tuberculosis	7	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
16	Cancer, malignant tumor	57	60	.....	1	.....	.....	1	2	.....	.....	1
17	Simple meningitis (except cerebro-spinal meningitis).	3	3	1	.....	1	.....	.....	2	.....	.....	.....
17a	Cerebro-spinal meningitis	3	2	.....	2	.....	.....	.....	2	1	.....	.....
18	Apoplexy and softening of the brain	33	45	.....	.....	.....	.....	.....	.....	.....	.....	.....
19	Organic heart diseases	95	77	.....	.....	.....	.....	.....	.....	1	1	1
20	Acute bronchitis	2	6	2	.....	.....	.....	.....	2	.....	.....	.....
21	Chronic bronchitis	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	47	46	9	3	3	.....	2	17	1	.....	.....
22a	Broncho-pneumonia	15	23	9	5	.....	.....	.....	14	.....	.....	.....
23	Other respiratory diseases	7	5	.....	.....	1	.....	.....	1	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	7	6	2	1	.....	.....	.....	3	.....	.....	.....
25	Diarrhea and enteritis (under two years).	33	28	29	4	.....	.....	.....	33	.....	.....	.....
26	Appendicitis and typhlitis	7	10	.....	.....	1	.....	.....	1	.....	.....	.....
27	Hernia, intestinal obstruction	9	11	1	.....	.....	.....	.....	1	.....	.....	.....
28	Cirrhosis of liver	3	7	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	63	65	.....	1	.....	.....	.....	1	1	.....	.....
30	Diseases of women (not cancer)	4	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	3	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	3	6	.....	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	39	41	38	.....	.....	.....	.....	38	.....	1	.....
34	Old age	.....	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	55	45	2	.....	2	1	2	7	6	2	2
36	Suicide	6	11	.....	.....	.....	.....	.....	.....	.....	.....	1
37	Other diseases	144	138	26	1	6	.....	2	35	.....	4	1
38	Ill-defined causes	2	5	1	.....	.....	.....	.....	1	.....	.....	.....

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex.		Abridged List Class Number.
															Males.	Females.	
34	41	48	40	49	43	49	42	49	47	50	28	18	17	2	424	369	
15	33	32	42	49	42	51	44	74	49	34	29	26	18	7	409	380	
.....	1	1	1	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	3	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	8	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	6
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	7
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	6	8
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	2	.....	9
.....	1	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	2	12
16	14	13	8	8	9	9	4	1	.....	.....	.....	.....	.....	.....	60	39	13
.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	9	3	14
1	3	1	.....	.....	.....	1	.....	.....	1	.....	.....	.....	.....	.....	2	5	15
2	.....	2	.....	4	4	6	4	11	6	9	3	2	1	.....	25	32	16
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	.....	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	17a
.....	.....	1	.....	1	1	1	3	4	8	6	4	.....	3	1	14	19	18
.....	2	3	4	6	5	10	8	12	11	17	7	2	5	.....	38	57	19
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	20
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	1	.....	21
3	4	4	2	2	2	.....	1	2	2	4	1	2	.....	.....	27	20	22
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	6	9	22a
.....	.....	1	.....	2	.....	.....	.....	.....	2	.....	.....	.....	1	.....	5	2	23
.....	1	.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....	1	.....	4	3	24
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	18	15	25
1	1	2	1	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	4	3	26
.....	.....	1	1	.....	.....	5	1	.....	.....	.....	.....	.....	.....	.....	4	5	27
.....	.....	.....	.....	1	.....	.....	.....	1	1	.....	.....	.....	.....	.....	3	.....	28
1	1	2	5	6	5	6	9	5	5	6	5	3	2	.....	39	24	29
.....	.....	.....	3	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	30
1	.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	31
.....	2	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	32
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	19	20	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	34
5	4	6	1	6	5	3	2	2	1	2	1	.....	.....	.....	42	13	35
1	.....	1	2	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	5	1	36
3	6	8	8	11	8	6	8	11	9	6	7	8	4	1	81	63	37
.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	1	1	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence.										
			1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	793	31	41	15	11	10	49	21	24	38	15	12
	Rates per 1,000 population ... June, 1912	13.40	11.94	16.58	11.73	9.81	9.44	15.55	17.48	8.81	16.31	7.02	4.91
	... June, 1911	13.93	11.09	15.66	12.59	13.53	12.31	14.40	18.97	10.75	12.84	10.90	9.33
1	Typhoid fever	8	3	1	1	.....	.....	.....	.....	.....	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	9	.....	1	.....	.....	.....	2	1	1	1	.....	.....
6	Scarlet fever	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
8	Diphtheria and croup	7	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
9	Influenza	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	6	.....	.....	.....	1	.....	.....	1	.....	1	.....	.....
13	Tuberculosis of the lungs	99	3	6	1	2	1	5	4	1	6	3	1
14	Tuberculous meningitis	12	1	.....	.....	.....	.....	2	2	.....	.....	.....	.....
15	Other forms of tuberculosis	7	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
16	Cancer, malignant tumor	57	5	1	.....	1	1	1	1	1	3	1	.....
17	Simple meningitis (except cerebro-spinal meningitis).	3	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
17a	Cerebro-spinal meningitis	3	.....	.....	.....	.....	.....	2	.....	.....	.....	.....	.....
18	Apoplexy and softening of the brain.	33	1	1	.....	.....	1	2	.....	1	.....	1	1
19	Organic heart diseases	95	4	4	2	3	1	5	3	3	4	3	.....
20	Acute bronchitis	2	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
21	Chronic bronchitis	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	47	1	5	2	.....	1	5	.....	2	4	.....	.....
22a	Broncho-pneumonia	15	1	1	.....	.....	.....	5	.....	.....	.....	.....	.....
23	Other respiratory diseases	7	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	7	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
25	Diarrhea and enteritis (under two years).	33	2	1	1	.....	.....	.....	.....	.....	2	.....	1
26	Appendicitis and typhlitis	7	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
27	Hernia, intestinal obstruction,	9	1	1	.....	.....	1	.....	.....	1	.....	.....	.....
28	Cirrhosis of liver	3	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....
29	Bright's disease and nephritis	63	2	1	3	.....	.....	2	2	1	2	2	4
30	Diseases of women (not cancer)	4	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....
31	Puerperal septicemia	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	39	.....	1	.....	1	.....	3	1	4	2	.....	1
34	Old age	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	55	3	3	1	1	.....	8	2	1	5	1	.....
36	Suicide	6	.....	1	.....	.....	.....	1	.....	.....	.....	1	1
37	Other diseases	144	3	11	4	2	3	2	4	8	6	3	3
38	Ill defined causes	2	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....
	Total deaths under one year	133	3	9	2	2	2	10	3	6	8	.....	1

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number.
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
24	25	27	20	27	20	27	21	64	35	35	26	38	23	7	....	100	7	
11.48	14.13	13.56	11.26	12.04	8.89	14.28	7.78	12.58	13.19	13.76	9.71	11.43	9.75	5.34	....	....	....	....
10.74	11.30	13.72	16.46	10.55	12.19	12.23	10.92	14.00	15.07	10.77	9.98	12.09	9.21	....	....	....	....	....
1	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	1	.....	....	....	...	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	4
.....	.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....	1	....	....	...	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	....	....	...	6
.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	7
.....	.....	.....	1	.....	.....	1	.....	1	.....	.....	.....	1	.....	.....	....	1	...	8
.....	.....	.....	.....	.....	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	9
.....	.....	1	.....	1	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	....	....	...	12
2	4	8	2	2	2	10	1	7	5	5	3	4	2	.....	....	9	...	13
.....	.....	1	.....	.....	1	.....	.....	2	.....	1	.....	.....	.....	.....	....	2	...	14
.....	.....	.....	.....	.....	.....	.....	1	1	.....	1	.....	.....	.....	.....	....	3	...	15
2	1	3	.....	3	3	1	3	6	.....	2	2	4	3	.....	....	9	...	16
.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	....	1	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	....	....	...	17a
3	3	.....	1	.....	1	2	.....	1	2	5	.....	2	1	1	....	3	...	18
3	1	2	5	4	.....	2	1	7	7	3	8	8	3	1	....	7	1	19
.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	20
.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	21
1	2	.....	1	1	3	.....	1	4	1	1	2	1	1	1	....	6	1	22
.....	.....	.....	.....	.....	.....	.....	.....	3	1	.....	.....	1	.....	.....	....	3	...	22a
.....	1	1	.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....	.....	....	2	...	23
.....	1	.....	.....	.....	1	.....	.....	.....	.....	1	1	.....	.....	.....	....	2	...	24
.....	2	.....	.....	2	.....	1	.....	15	.....	.....	.....	.....	2	.....	....	3	1	25
.....	.....	.....	.....	1	1	.....	.....	.....	.....	.....	.....	3	.....	1	....	1	...	26
.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	....	3	...	27
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	28
5	1	1	1	5	1	4	3	5	6	4	.....	4	2	.....	....	2	...	29
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	.....	....	1	...	30
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	....	1	...	31
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	2	...	32
1	3	1	.....	1	2	.....	2	3	2	5	1	1	1	1	....	2	...	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	34
1	1	3	1	2	.....	3	.....	3	1	.....	1	.....	1	1	....	10	2	35
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	....	1	...	36
5	4	4	5	3	5	1	8	4	9	4	4	8	4	.....	....	26	1	37
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	38
2	8	4	1	4	5	2	4	21	3	6	2	3	2	1	....	17	2	

VITAL STATISTICS.

June Infant Mortality.

Detailed List Class Number.	Causes of Death.	June Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	133	129	17	12	6	9	8	6	5	13	11	27	6	13	26	55	17
	Male	71	75	9	6	4	4	5	3	4	7	5	13	1	10	12	31	8
	Female	62	54	8	6	2	5	3	3	1	6	6	14	5	3	14	24	9
	White	130	126	17	12	5	9	8	6	5	13	11	25	6	13	26	53	16
	Colored	3	3	...	...	1	...	...	...	...	...	...	2	...	...	.....	2	1
1	Typhoid fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
5	Smallpox	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
6	Measles	3	1	...	...	...	...	...	...	...	...	...	...	1	2	1	2	...
7	Scarlet fever	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
8	Whooping cough	1	3	...	...	...	...	...	...	...	1	...	...	...	...	1	.....	...
9	Diphtheria and croup	1	1	...	...	...	...	...	...	...	...	...	...	...	1	.....	1	1
10	Influenza	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
14	Dysentery	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
18	Erysipelas	3	1	...	...	...	...	...	1	...	...	1	1	...	...	2	1	...
19	Other epidemic diseases	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
20	Pus-infection and septicemia,	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
24	Tetanus	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
28	Tuberculosis of the lungs	1	.....	...	...	...	...	...	...	...	...	...	...	...	1	.....	1	...
29	Acute miliary tuberculosis	2	.....	...	...	...	...	...	...	...	...	...	...	...	2	.....	2	2
30	Tuberculous meningitis	2	1	...	...	...	...	...	...	...	...	...	2	...	...	.....	2	...
31 35	Other forms of tuberculosis	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
36	Rickets	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
37	Syphilis	2	2	...	...	...	...	1	...	1	...	...	...	...	...	.....	1	...
38	Gonococcus infection	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
61	Simple meningitis	1	.....	...	...	...	...	...	...	1	...	...	...	...	...	.....	1	...
61a	Cerebro-spinal fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
63a	Acute poliomyelitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
71	Convulsions	2	1	...	1	...	...	...	...	...	...	...	1	...	...	.....	1	...
76	Diseases of the ears	1	.....	...	...	...	...	...	...	...	1	...	...	...	...	.....	1	1
79	Organic diseases of the heart,	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
89	Acute bronchitis	2	2	...	...	...	...	...	...	...	1	...	1	...	...	.....	2	...
91	Broncho-pneumonia	9	10	...	...	...	1	...	...	...	2	2	3	1	...	2	6	3
92	Pneumonia	9	8	...	...	1	...	1	...	...	3	1	...	1	2	6	1	1
93	Pleurisy	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	..
103	Other diseases of stomach	2	.....	...	...	...	...	...	...	...	...	...	1	...	1	2	.....	...

June Infant Mortality.—*Concluded.*

Detailed List Class Number.	Causes of Death.	June Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
104	Diarrhea and enteritis	29	26	...	...	...	...	2	1	2	3	4	14	1	2	7	20	2
108	Appendicitis and typhlitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
109	Hernias, intestinal obstruction,	1	2	...	...	...	...	...	1	*	...	...	...	...	...	1	.....	...
117	Simple peritonitis	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	...
119	Acute nephritis	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	...
143	Furuncle	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	...
144	Acute abscess	.....	2	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	...
145	Other diseases of skin, etc.	1	2	...	...	...	...	1	...	...	...	...	...	...	...	...	.....	...
150*a*	Hydrocephalus	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	...
b	Congenital malformations of heart.	8	9	1	2	1	2	1	...	...	1	...	...	...	...	...	1	...
c	Other malformations	1	.....	...	...	...	1	...	...	...	...	...	...	...	...	...	.....	...
151*a*	Premature birth	22	.....	9	4	2	1	2	2	1	1	...	...	...	...	1	3	...
b	Congenital debility	7	31	1	1	...	1	...	...	...	...	1	3	...	...	...	4	2
152*a*	Injuries at birth	7	.....	3	2	1	1	...	...	...	...	...	...	...	...	...	.....	1
b	Other causes peculiar to early infancy.	7	16	2	...	1	2	...	1	...	...	1	...	...	...	...	2	1
167	Burns (conflagrations excepted).	1	.....	...	...	...	...	...	...	...	...	...	...	...	1	....	1	...
168	Absorption of deleterious gases,	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	...
172	Traumatism by fall	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	...
182, 184	Homicide	1	.....	...	...	...	...	...	...	...	...	...	...	1	...	....	1	...
187, 189	Ill-defined diseases	1	.....	...	...	...	...	...	...	...	...	1	...	...	...	1	.....	...
	Other causes	6	7	1	2	...	...	...	...	...	...	...	1	1	1	2	1	2
	Breast fed *	26	21	...	...	...	...	...	3	...	6	2	5	5	5	26	.....	...
	Bottle fed *	55	61	...	...	...	...	...	3	5	7	9	22	1	8	....	55	14
	Nonresidents	17	7	1	1	...	1	...	...	...	2	4	4	...	4	....	14	...

* Aged two weeks and over.

Additional Deaths for Other Months.

March, 1912.—1 male; ill defined disease; black; condition unknown; 30 years; residence unknown; birthplace unknown; mother nativity, unknown.

April, 1912.—1 male; homicide by other means; white; condition unknown; 30 years; residence unknown; birthplace unknown; mother nativity, unknown.

May, 1912.—1 male; tuberculosis; white; single; 30 years; residence, Ward 13; born in Canada; mother born in Canada.

DIVISION OF COMMUNICABLE DISEASES.

Medical Inspectors.

New cases visited:	
Diphtheria:	
a. Isolation	44
b. Diagnosis	4
Scarlet fever:	
a. Isolation	36
b. Diagnosis	8
c. Release	40
Measles	
a. Isolation	34
b. Diagnosis	6
Varicella:	
a. Isolation	65
b. Diagnosis	8
Epidemic cerebro-spinal meningitis	2
Anthrax	1
Ophthalmia neonatorum	5
Tuberculosis	36
Deaths investigated	17

Nurses.

New cases visited:	
Measles	624
Varicella	93
Typhoid fever	34
Whooping cough	38
Cerebro-spinal meningitis	2
Scarlet fever	67
Diphtheria	96
Malaria	5
Mumps	27
Ophthalmia	105
Trachoma	2
Old cases visited	1,468
Release cultures taken for diphtheria	77

Disinfections.

Diphtheria	72
Scarlet fever	53
Tuberculosis	144
Infected bedding	2 lots
Infected books, etc.	21 lots
Infected clothing, etc.	1 lot

Forcible Removals.

Typhoid fever	1
Scarlet fever	2
Tuberculosis	3
Syphilis	1

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum.
1	....	....	....	....	....	....	....	....	....	....	9	....	1
2	....	....	....	....	....	7	....	....	....	....	11	1	9
3	....	....	....	....	....	2	....	....	....	....	6	2	4
4	....	....	....	....	....	1	....	....	....	....	3	....	4
5	....	....	....	....	....	1	....	....	....	....	10	....	2
6	....	....	....	....	2	5	....	....	....	....	25	2	10
7	....	....	....	....	....	3	....	1	1	....	31	1	3
8	....	....	....	....	....	9	....	....	....	....	41	....	20
9	....	....	....	....	....	1	....	....	....	....	81	....	8
10	....	....	....	....	....	1	....	....	1	1	10	....	1
11	....	....	....	....	....	1	....	....	....	....	4	....	1
12	....	....	....	....	....	5	....	....	....	....	46	1	3
13	....	....	....	....	....	1	....	....	....	....	15	1	5
14	....	....	....	....	....	1	....	....	1	....	10	....	5
15	....	....	....	....	....	3	....	....	....	....	8	3	1
16	....	....	....	....	....	10	....	....	....	....	16	....	1
17	....	....	....	....	....	6	....	....	....	....	11	1	2
18	....	....	....	....	....	5	....	....	....	....	20	3	3
19	....	....	....	....	....	3	....	....	1	....	65	1	3
20	....	....	....	....	....	4	....	....	....	....	31	....	2
21	....	....	....	....	....	7	....	....	1	....	51	1	2
22	....	....	....	....	1	3	....	....	....	....	36	....	....
23	....	....	....	....	....	1	....	....	....	....	16	....	....
24	1	....	....	....	....	9	....	....	....	....	18	....	....
25	....	....	....	....	....	1	....	....	1	....	17	1	....
26	....	....	....	....	....	....	....	....	....	....	3	....	....
Total	1	....	....	....	3	90	....	1	6	1	594	18	90
Unknown	....	....	....	....	....	....	....	....	....	....	....	....	....
Nonresidents	....	....	....	....	....	3	....	....	1	....	11	3	7
Grand total	1	....	....	....	3	93	....	1	7	1	605	21	97
Corresponding month last year	1	....	....	....	8	222	....	....	3	1	489	24	75

COMMUNICABLE DISEASES.

Cases Reported. **June, 1912.**

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
3	....	....	....	....	7	2	16	....	4	1	....	1
2	....	....	....	....	16	1	9	....	10	5	....	2
.....	....	....	....	....	3	....	2	....	.....	.....	....	3
2	....	....	....	....	7	....	1	....	.....	.....	....	4
.....	....	....	....	....	6	1	....	....	.....	.....	....	5
3	....	....	....	....	17	1	4	....	7	8	....	6
1	....	....	....	....	15	2	....	....	2	.....	....	7
8	....	....	....	....	14	2	3	....	5	1	....	8
.....	....	....	....	....	20	2	2	....	3	4	....	9
.....	....	....	....	....	4	1	1	....	1	3	....	10
.....	....	....	....	....	4	....	....	....	1	.....	....	11
5	....	....	1	....	9	2	2	....	1	1	....	12
2	....	....	....	....	9	....	1	....	4	.....	....	13
2	....	....	....	....	8	1	....	....	2	6	....	14
.....	....	....	....	....	7	....	....	....	4	.....	....	15
1	....	....	....	....	9	....	1	....	4	1	....	16
2	....	....	....	....	7	1	....	....	4	3	....	17
1	....	....	....	....	16	1	1	....	12	2	....	18
1	....	....	....	....	8	1	2	....	11	2	....	19
2	....	....	....	....	13	2	3	....	5	1	....	20
1	....	....	....	....	6	....	2	....	1	.....	....	21
.....	....	....	....	....	9	1	2	....	1	1	....	22
3	....	....	....	....	5	....	....	....	.....	3	....	23
4	....	....	....	....	15	....	1	....	2	3	....	24
1	....	....	....	....	6	....	3	....	.....	1	....	25
9	....	....	....	....	3	....	....	....	1	.....	....	26
53	....	....	1	....	243	21	56	....	85	46	....	Total
.....	....	....	....	....	2	....	....	....	.....	.....	....	Unknown
8	....	....	3	....	8	4	....	....	1	.....	....	Nonresidents
61	....	....	4	....	253	25	56	....	86	46	....	Grand total
113	....	1	2	....	273	....	39	....	76	78	....	Corresponding month last year.

DIVISION OF CHILD HYGIENE.—JUNE, 1912.

1. Medical Inspection of Schools.

Number inspections made	6,667
Number physical examinations made	2,702

There were 760 children excluded from school during the month, ill with contagious disease, as follows:

Diphtheria	1	Influenza	2
Scarlet fever	2	Pediculosis	247
Measles	14	Trachoma	3
German measles	9	Acute conjunctivitis	24
Chicken pox	22	Ringworm	8
Mumps	2	Scabies	16
Pulmonary tuberculosis (suspected)	1	Impetigo	25
Acute tonsilitis	36	Favus	1
Erysipelas	1	Miscellaneous	346

There were 5,850 cases of noncontagious disease found, subdivided as follows:

Diseases of oral and respiratory tract	1,260
Diseases of eye	269
Diseases of ear	51
Diseases of skin	631
Dental caries	945
Miscellaneous	2,694

2. Physical Examination of Licensed Minors.

There were 1,121 children between the ages of 14 and 16 years examined during the month. Six hundred and thirty-four were found without defects and 487 with defects as follows:

Defective hearing	2	Cervical glands	1
Defective eyesight	41	Orthopedic defects	1
Hypertrophied tonsils	134	Bronchitis	6
Defective teeth	349	Skin disease	11
Cardiac disease	12	Miscellaneous	4
Defective palate	2		

3. Post-Natal Work.*

Cases	1,802	Bottle-fed babies	402
Visits	1,920	Both feedings	130
Breast-fed babies	1,270		

Defective Conditions Noted.

Cervical glands	2	Otitis media	1
Improper feeding	132	Skin disease	7
Ophthalmia	11	Miscellaneous	2
Orthopedic defects	7		

* On June 1 the number of nurses was increased to ten.

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:		
Positive for diagnosis	53	
Positive for release	44	
Negative for diagnosis	495	
Negative for release	118	
"No growth" cultures	6—	716
TUBERCULOSIS:		
Positive	100	
Negative	349	
Unsatisfactory	0—	449
TYPHOID:		
Positive	27	
Negative	156	
Atypical	5—	188

GLANDERS:	Strauss.	C.	F.	Ag.	
Positive	4	6	5	15	
Negative	2	5	5	12	
Unsatisfactory	2	0	0	2	
Atypical	0	0	2	2—	31

GONORRHEA:		
Positive	48	
Negative	92	
Unsatisfactory	1—	141
GONORRHOEAL OPHTHALMIA:		
Positive	3	
Negative	55	
Unsatisfactory	0—	58
OTHER EXAMINATIONS:		
*Positive	20	
Negative	39	
Unsatisfactory	0—	59
BACTERIOLOGICAL MILK EXAMINATIONS	468	468
Bacteriological ice cream examinations	21	21
Cultures for streptococci	415	415
Total	2,546	2,546

SPECIAL WORK:
Longevity of tubercle bacilli in sputa.
Cultural tests of streptococci.
Examination of cow feces for tubercle bacilli.
Investigation of the complement fixation for syphilis and gonorrhea.

* K-L Vir. organisms, conradi, malaria, G-U. T. B., paratyphoid, typhoid urines.

INSPECTION OF MILK, VINEGAR, ETC.

Examination as to Statute Requirements.

Samples examined, milk from stores	439
" " milk from wagons	565
" " milk brought in by citizens	48
" " milk for bacteriological examination	468
" " ice cream	21
" " vinegar	22
" " butter and cheese	11
Total samples	1,574

INSPECTION OF DAIRIES.

Satisfactory * on first inspection	126	
Satisfactory on later inspection	511	
	—	637
Unsatisfactory on first inspection	117	
Unsatisfactory on later inspection	63	
	—	180
Total number of inspections		817
Dairies having milk rooms	392	
Dairies without milk rooms	425	
Number of cattle inspected	10,920	
Number of dairies prohibited shipping milk to Boston because of insanitary conditions of premises	37	

* "Satisfactory" means having a score of at least 45 per cent by the government score card.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	224	Cattle condemned (8 and parts),	3,232 lbs.
Calves inspected	742	Calves condemned (2 parts)	71 lbs.
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	3,072	Swine condemned (3 parts)	2,115 lbs.

INSPECTION OF PROVISIONS.—ARTICLES CONDEMNED.

Meats.

Veal (tainted)	280 lbs.
Bear meat (tainted)	300 lbs.
Mutton (tainted)	15 lbs.
Beef (tainted)	5,876 lbs.
Pork (tainted)	45 lbs.
Poultry (tainted)	415 lbs.

Miscellaneous.

Potatoes (decayed)	1,690 bush.
Vegetables (decayed)	9 bush.
Fruit (decayed)	16 bush.
Cheese (tainted)	35 lbs.
Canned goods	674 cans.

SANITARY INSPECTION DIVISION.

New reports	2,754
Reinspections	9,936
New tenement house reports	103
Nuisances reported	5,029
Legal notices	419
Court cases	10
Fines	$123
Tenements vacated	5
Stable permits granted	3
Stable hearings	5
Dump permits granted	3
Dump permits revoked	2

QUARANTINE.

Vessels inspected at quarantine	72
Total immigrants arriving in Boston	6,888

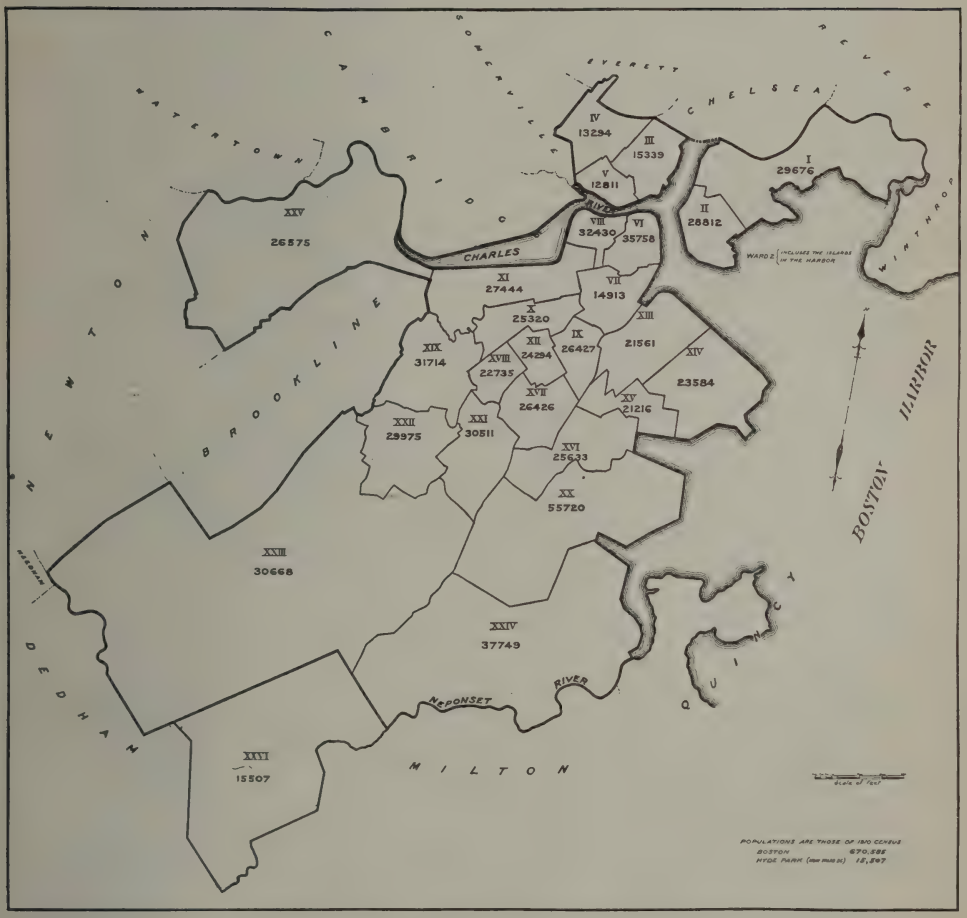
MONTHLY METEOROLOGICAL SUMMARY.

Taken at Weather Bureau, Boston, June, 1912.

Day.	Temperature, Degrees Fahrenheit.			Relative Humidity.	Daily Precipitation.	Actual Hours Sunshine.	Wind.		
	Maximum.	Minimum.	Mean.				Average Hourly Velocity. (Miles.)	Maximum Velocity. (Miles.)	Prevailing Direction.
1.....	80	52	66	65	0	14 7	11.0	22	W.
2.....	92	63	78	63	0	14.4	10.5	19	S. W.
3.....	84	69	76	59	T	13.1	12.8	26	W.
4.....	86	64	75	64	0	13.4	12.3	26	S. W.
5.....	74	60	67	51	0	15.1	12.4	23	W.
6.....	72	56	64	67	.24	6.8	11.0	29	S. W.
7.....	70	48	59	58	0	14.0	13.4	21	N. W.
8.....	69	45	57	55	0	15.2	9.7	19	S. W.
9.....	70	50	60	37	0	15.2	12.2	25	N. W.
10.....	75	47	61	39	T	14.2	13.0	23	W.
11.....	76	56	66	54	T	13.9	6.9	12	E.
12	82	65	74	53	T	6.5	11.1	19	W.
13.....	68	50	59	50	0	14.5	16.9	30	N. W.
14.....	60	47	54	62	0	15.2	8.8	14	S. E.
15.....	62	50	56	67	0	13.1	10.2	22	S. E.
16.....	68	55	62	78	.02	3.2	11.8	25	S.
17.....	87	64	76	76	T	8.6	11.0	21	S. W.
18.....	78	59	68	46	0	14.5	12.8	23	W.
19.....	75	56	66	56	0	14.5	9.3	15	N. W.
20.....	81	58	70	52	0	13.2	9.4	17	W.
21.....	83	63	73	56	T	12.3	8.7	18	W.
22.....	76	64	70	54	0	12.9	7.8	14	S. E.
23.....	86	61	74	57	0	15.2	9.5	16	W.
24.....	90	64	77	42	0	15.0	10.7	19	W.
25.....	88	70	79	68	T	11.6	11.0	19	W., S. W.
26.....	88	69	78	56	.01	11.8	12.5	21	N.
27.....	69	59	64	67	0	15.2	10.9	19	E.
28.....	86	57	72	71	0	15.2	10.8	20	S. W.
29.....	90	68	79	54	T	11.9	12.2	25	W.
30.....	72	54	63	37	0	15.2	12.0	21	N.
Totals.....	—	—	—	—	.27	279.6	—	—	—
Means.....	77.9	58.1	68.1	57.1	—	9.3	11.1	—	W.

Latitude 42 degrees 21 minutes. Longitude 71 degrees 4 minutes.

BOSTON WARD MAP.



Vol. 1 JULY, 1912 No. 7

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF THE

CITY OF BOSTON

	Page
Tenement Houses and Sanitary Inspection	177
Vital Statistics, July, 1912	182
Monthly reports	192

CITY OF BOSTON
PRINTING DEPARTMENT
1912

ORGANIZATION OF THE HEALTH DEPARTMENT.

SAMUEL H. DURGIN, M. D., *Chairman.*
FRANCIS X. MAHONEY, M. D.
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

UNION PRINTING CO.
TRADES UNION LABEL COUNCIL
BOSTON, MASS.

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, JULY, 1912. NO. 7.

TENEMENT HOUSES AND SANITARY INSPECTION.

BY THOMAS JORDAN,
Chief Sanitary Inspector, Boston Health Department.

A tenement house, according to the Massachusetts law, is a house which contains more than three families living independently and cooking on the premises. There are about 7,500 tenement houses in the City of Boston, and nearly 5,000 of these are situated in the congested sections of the city, *i. e.*, the North, South and West Ends. The Board of Health is required by statute law to make semiannual examinations of all these houses, but up to the present year it has been impossible to comply fully with the law, on account of an insufficient force of inspectors. During the present year, however, twelve inspectors have been added to the force, making the total number thirty-two, which is adequate to comply with the demands of the present law. The inspector must make a correct measurement of each sleeping room, and must report the number of occupants, adults, children and lodgers in the tenement. He must also specify the number occupying each room and the condition as to light and ventilation. If it is found that any room is overcrowded the inspector stencils upon the wall the number who may be allowed to occupy the room. A new card index system of the reports of inspection of tenement houses, begun last year, has been completed, so that at present there is on file in the office of the Board a complete card index system and census of the tenement houses of the city. The index cards give the following information: The number of tenements; the number of rooms in each tenement; the number of persons occupying each room; the location of doors and windows and the size of same; the air shafts, if any, and openings into same; the location of water-closets, means for their light and ventilation, and the number of persons

using each; the number and location of sinks and bath tubs; the condition of the drain and whether the fixtures are supplied with proper traps; whether whitewashing is needed; the condition of yards, areas and cellars, whether clean, paved and drained; whether proper receptacles are provided for garbage and ashes. If any nuisances are found on the premises a nuisance card report is made by the inspector, which is followed up by a visit every five days until the nuisance is abated.

One of the most serious conditions found in tenement houses in the congested sections of the city is the overcrowding of sleeping rooms. Under the regulations of the Board of Health 400 cubic feet of air space is required for each person. This overcrowding exists mostly during the winter months, when the laborers who have been working out of town on sewers, streets and railways during the summer flock into the city to hire rooms. A visit is made by the inspector of the district in the daytime where apparent cases of overcrowding exist. A visit is then made at midnight, as that is the only time when positive proof can be obtained as to the number of people occupying the room or rooms, and this in such cases is almost invariably in excess of the number given the inspector when on his day visit. Portable beds which are hidden during the day are pressed into service at night, frequently mattresses are placed on chairs, tables and kitchen stoves, and during the last winter three men were found sleeping on mattresses placed on top of a piano.

The only remedy in the law for this overcrowding is a vacation of the premises. The rooms are measured and vote is then taken by the Board of Health as to the number who may occupy the same, the room is stenciled and another night visit is made to determine whether the rooms are still occupied in excess of the number allowed; if so, the Board votes to vacate the premises. This has to be done over and over again, and in some instances the same persons have been ordered to vacate premises every year for the last eighteen years.

The Board of Health for the last two years has had a bill in the Legislature to make this overcrowding a criminal offence, but this measure has been twice defeated. There is no question but that this should be made a law. Almost invariably when the families have children the children are obliged to sleep on the floors, generally in their day clothing, and that this is not on account of poverty is shown by the fact that out of thirty-four cases during the year 1910, all of whom were arrested and brought to court, a cash bail of $300 was furnished by the offender in every instance, after trial a fine of

from $20 to $50, usually $50, was imposed and each fine was paid on the spot. These different persons were arrested under the Public Lodging House Act, which provides that no person shall run a lodging house for ten or more persons at a charge of less than twenty-five cents (25c.) per night. These offenders were found to be letting beds at ten cents (10c.) per night in numbers ranging from fifteen to thirty-four. In one instance a man was found with sixteen lodgers, himself and wife and three children sleeping in the kitchen, and four grown daughters ranging from sixteen to twenty-two years of age sleeping in a dark closet. The father worked for a salary of $12 a week, one daughter at $11, two daughters at $10 and one at $9 per week.

There is no doubt that if this overcrowding was made a criminal offence it would break up the business, as it is surely done for a profit. In no instance has a second offence occurred where the offender has been brought into court and fined; but on the other hand, repeated instances have been found every year during the last fifteen to eighteen years of the same offenders who have been driven from house to house by the order of the Board of Health to vacate on account of overcrowding.

Another serious offence in regard to the tenement house conditions is the throwing of rubbish, garbage, etc., from the windows of the tenements, and this custom is continually growing, not only in the poorer sections of the city, but even to greater extent in the better class of apartment houses, especially where light housekeeping is done. The tenants as a rule cook their breakfasts and suppers in their apartments and then wrap up the garbage in paper and throw it out of the window; as a rule it is thrown into the yard of the adjoining house, either at one side or in the rear, and the Board of Health is obliged to compel the innocent owner of the adjoining property to clean up the garbage and refuse of the neighboring offender. This, of course, always creates a good deal of feeling, but is the only remedy under the law unless the offender can be caught in the act. This is very seldom done, and even the owner of the property, when on the watch, is unable to detect the guilty party, as nothing but the hand and arm is ever seen at the window when the act is committed.

Up to the year 1892 the law governing the number of families in a tenement house included three family houses, as it does in most of the large cities of the United States, and in fact in the western cities the law has been revised so as to include two family houses. Three family houses should be included in the tenement house law since in these houses the conditions

are generally such as to require supervision far more than in houses containing a larger number of families. A higher class of construction is required in tenement houses by law than is found in many of these three family houses. A great many of these houses have been altered from single family into three family houses, without providing the proper sanitary equipment, and in the majority of these houses some provision should be made by law for the care of the yards, areas, water-closets, whitewashing, and ash and garbage receptacles. For the past two years the Board of Health has had a bill in the Legislature, entered by his Honor the Mayor, to include these three family houses in the tenement house law, as they were prior to the repeal of the law in 1892, but in both Legislatures the bill has been defeated.

A great deal of good work has been done by the Board of Health since 1907, when a law was passed which was amended in 1909, giving the Board the authority to remove old sheds and buildings which were attached to the main building and also to the adjoining property. About 2,400 of these old sheds and buildings have been removed since the passage of the law, thus providing good light and ventilation to the rear parts of the main buildings from which these sheds have been removed. The yards have been paved and drained and new fences built. This has been one of the best works ever undertaken by the Board of Health and a great deal of good has been accomplished, but during the last three years very little has been done on account of lack of appropriation. A specific sum of at least $10,000 should be provided each year for this particular work, as no better sanitary work can be done than to remove these rotten old sheds and ells, thus providing air space and sunlight for the rear of these buildings in the congested districts.

The following is a comparison of the number of reports, nuisances and legal notices for the past ten years:

Year.	Number of Reports.	Number of Nuisances.	Number of Legal Notices.
1903	6,002	15,850	1,714
1904	7,662	13,945	1,699
1905	12,474	14,816	2,017
1906	7,406	10,840	1,247
1907	7,143	12,287	1,096
1908	12,848	26,220	2,529
1909	12,778	24,324	2,488
1910	15,660	30,743	2,914
1911	18,320	34,914	3,925
1912*	12,315	22,728	2,120

*Total for six months only.

Places Visited by Sanitary Inspectors.

7,500 tenement houses visited twice a year.
4,500 milk stores visited once a month.
500 bakeries visited once a month.
3,000 ice cream places visited once a month.
250 blacksmith shops visited once in three months.
7,500 stables visited once in three months.
22 public lodging houses visited twice a week.
900 barber shops visited once a month.

In addition to the above, there are about 6,000 complaints yearly from citizens by letter, telephone and in person and from various city departments (building, fire, police and public works) as well as from the different associations in the city. The inspectors report 10,000 other places found by them on their respective districts. These reports are followed up until conditions are remedied, requiring many more visits.

In addition to the force of sanitary inspectors, there is a corps of ten police officers detailed from the Police Department to look after dirty yards, passageways, vacant lots, etc.

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF JULY, 1912.

Boston had 889 deaths in July, compared with 1,272 for July of last year, and a death rate of 14.54 against 21.74 for July, 1911.

Of deaths from reportable diseases the principal decreases were diphtheria, 6, and scarlet fever, 4; and the principal increase was tuberculosis (all forms), 14.

Other important differences were as follows:

July, 1912, decreases compared with July, 1911:

Effects of heat	213
Diarrhea and enteritis under 2 years	50
Apoplexy	26
Brights disease	24
Organic heart disease	23
Pneumonia and broncho-pneumonia	14
Hernia and intestinal obstruction	10
Meningitis	5

July, 1912, increases compared with July, 1911:

Violent deaths (effects of heat deducted)	16
Cancer	6

There were 79 less deaths under 1 year than in July, 1911, and 120 less over 60 years of age.

Ward 10 had the lowest rate, 7.70, and Ward 7 the highest, 20.14. Deaths of nonresidents were 123 against 145 in July, 1911.

Only 78 cases of diphtheria were reported against 113 in July, 1911, and 33 cases of scarlet fever against 60 in July, 1911.

On the other hand, there were 302 cases of measles against 191 in July, 1911, and 276 cases of pulmonary tuberculosis against 226 in July, 1911.

There were 201 deaths under 1 year, which is 33 less than the average for July for the preceding five years.

Eighty-eight of these deaths were due to premature birth, congenital debility, malformations, and other diseases peculiar to early infancy; 73 to diarrhea and enteritis; 14 to pneumonia; 9 to reportable diseases; and 17 to other causes. Of these deaths under 1 year, Ward 6 furnished the largest number, 16,

and Wards 2 and 20 came next with 12 each. One hundred and twenty-three were over 2 weeks old, and of these 88 were bottle fed.

Inasmuch as the high mortality records of July, 1911, were undoubtedly due to the extreme heat of that month, a brief comparison of July, 1912, with July, 1910, is given below.

July, 1912, important decreases compared with July, 1910:

Diarrhea and enteritis (under 2 years)	23
Ill-defined diseases	15
Apoplexy	12
Diphtheria	10

July, 1912, important increases compared with July, 1910:

Organic heart disease	27
Violent deaths	15
Cancer	12

For July, 1910, total deaths were 926, and total deaths under 1 year were 225.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
* Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	137.06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	‡298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston January 1, 1912, and became Ward 26. Under "Boston," in the above table, Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau.

‡ An infant asylum is located in this ward.

July. General Summary.

	1912.	1911.
Total deaths	889	1,272
Population, estimated*	720,031	688,912
Death rate per 1,000	14.54	21.74
Deaths of nonresidents	123	145
Corrected death rate†	12.53	19.26

*Population estimated by arithmetical method used by Census Bureau.
†Nonresidents not included.

July, 1912. Statement of Deaths.

Total number (stillbirths excluded)	889
Sex.	
Males	471
Females	418
Condition.	
Single	474
Married	260
Widowed	139
Divorced	9
Unknown	7
Color.	
White	854
Black (negro or mixed)	33
Chinese	2
Deaths of children:	
Under one year	201
Under two years	240
Under five years	269
Stillbirths during the month,	50

Nativity.	
United States	569
Ireland	149
England and Wales	17
Scotland	8
Germany	9
Canada	51
Italy	23
Russia and Poland	30
Sweden and Norway	8
France	—
Other countries	18
Unknown	7
Nativity of Mothers.	
United States	248
Ireland	292
England and Wales	24
Scotland	15
Germany	16
Canada	75
Italy	62
Russia and Poland	55
Sweden and Norway	13
France	1
Other countries	24
Unknown	64

Abridged List Class Number.	Causes of Death.	Totals. July, 1912.	Totals. July, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes {1912 / 1911}	889 /	..... / 1,272	201 / 280	39 / 53	15 / 27	11 / 9	3 / 10	269 / 379	17 / 14	13 / 13	24 / 22
1	Typhoid fever	3	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	5	5	1	2	.....	2	.....	5	.....	.....	.....
6	Scarlet fever	.....	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough	7	6	3	3	.....	.....	1	7	.....	.....	.....
8	Diphtheria and croup	5	11	.....	1	1	1	.....	3	2	.....	.....
9	Influenza	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
10	Asiatic cholera	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
11	Cholera nostras	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	4	5	1	1	.....	.....	.....	2	.....	.....	.....
13	Tuberculosis of the lungs	93	76	2	2	1	.....	1	6	.....	2	7
14	Tuberculous meningitis	10	11	1	4	2	1	.....	8	1	.....	1
15	Other forms of tuberculosis	3	5	.....	1	.....	1	.....	2	1	.....	.....
16	Cancer, malignant tumor	59	63	.....	.....	.....	.....	.....	.....	.....	.....	.....
17	Simple meningitis (except cerebro-spinal meningitis).	5	10	.....	.....	1	.....	.....	1	.....	.....	1
17a	Cerebro-spinal meningitis	6	4	.....	.....	1	.....	.....	1	1	.....	.....
18	Apoplexy and softening of the brain	36	62	1	.....	.....	.....	.....	1	.....	.....	.....
19	Organic heart diseases	99	122	.....	.....	.....	.....	.....	.....	1	2	3
20	Acute bronchitis	1	5	.....	1	.....	.....	.....	1	.....	.....	.....
21	Chronic bronchitis	3	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	41	49	5	3	1	1	.....	10	.....	.....	1
22a	Broncho-pneumonia	21	27	9	4	1	.....	.....	14	1	.....	.....
23	Other respiratory diseases	9	6	1	3	.....	.....	.....	4	1	.....	.....
24	Diseases of the stomach (cancer excepted).	4	7	.....	.....	.....	.....	.....	.....	.....	.....	.....
25	Diarrhea and enteritis (under two years).	85	135	73	12	.....	.....	.....	85	.....	.....	.....
26	Appendicitis and typhlitis	11	13	.....	.....	.....	.....	.....	.....	1	2	2
27	Hernia, intestinal obstruction	3	13	1	.....	.....	.....	.....	1	.....	.....	.....
28	Cirrhosis of liver	3	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	52	76	1	.....	.....	.....	.....	1	.....	1	1
30	Diseases of women (not cancer)	8	6	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	5	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	6	7	.....	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	65	67	64	.....	.....	.....	.....	64	.....	1	.....
34	Old age	4	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
35*	Violent deaths	75	272	3	1	5	4	1	14	6	3	4
36	Suicide	8	7	.....	.....	.....	.....	.....	.....	.....	.....	.....
37	Other diseases	150	181	35	1	2	1	.....	39	2	2	4
38	Ill-defined causes	.....	11	.....	.....	.....	.....	.....	.....	.....	.....	.....

* 1 male, age unknown.

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex. Males.	Sex. Females.	Abridged List Class Number.
33	29	46	43	46	50	56	47	52	43	53	31	17	18	2	471	418	
41	55	47	58	78	69	86	74	72	72	69	56	40	16	11	730	542	
.....	1	.....	.....	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	2	1	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	3	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	6
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	5	7
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	3	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	9
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	10
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	11
.....	1	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	1	3	12
9	9	14	10	11	6	6	6	4	1	1	.....	.....	1	.....	48	45	13
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	5	14
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	2	15
.....	.....	1	3	2	10	7	10	11	4	5	3	1	2	.....	13	46	16
.....	1	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	1	17
1	.....	.....	1	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	....	3	3	17a
.....	.....	.....	1	4	3	3	2	5	5	7	2	2	1	.....	13	23	18
2	2	2	3	6	6	10	6	9	14	14	9	4	4	2	45	54	19
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	20
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	1	.....	.....	1	.....	1	2	21
1	4	4	1	2	5	1	2	2	2	3	.....	2	1	.....	24	17	22
.....	.....	.....	.....	.....	1	.....	1	.....	.....	2	1	.....	1	.....	13	8	22a
.....	.....	1	.....	.....	.....	2	.....	.....	.....	.....	1	.....	.....	.....	5	4	23
.....	.....	.....	.....	.....	.....	1	.....	.....	1	.....	.....	2	.....	.....	3	1	24
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	47	38	25
1	.....	.....	.....	1	.....	1	1	2	.....	.....	.....	.....	.....	.....	10	1	26
.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	1	2	27
.....	.....	1	.....	.....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	2	1	28
2	1	3	5	5	3	3	5	4	5	6	5	.....	2	.....	30	22	29
2	1	1	1	1	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	8	30
1	2	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	31
1	2	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	6	32
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	39	26	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	2	1	.....	1	3	34
8	4	6	6	5	3	6	.....	2	1	2	4	.....	.....	.....	59	16	35
1	.....	1	2	2	.....	.....	2	.....	.....	.....	.....	.....	.....	.....	6	2	36
4	1	7	8	6	7	13	9	13	10	12	5	4	4	.....	88	62	37
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence. 1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	889	28	50	21	21	17	53	25	28	24	17	21
	Rates per 1,000 population ... July, 1912	14.54	10 44	19.56	15.89	18.12	15.54	16.28	20.14	9.94	9.97	7.70	8.32
	... July, 1911	21.74	17.25	23.14	20.56	34.92	23.83	22.81	30.33	16.50	25.71	12.84	9.03
1	Typhoid fever	3	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	5	.....	.....	.....	.....	.....	1	.....	1	1	.....	.....
6	Scarlet fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough	7	1	2	.....	.....	1	.....	.....	.....	.....	.....	.....
8	Diphtheria and croup	5	.....	.....	.....	.....	.....	2	.....	.....	.....	.....	.....
9	Influenza	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	4	1	.....	.....	.....	.....	.....	1	.....	1	.....	.....
13	Tuberculosis of the lungs	93	3	6	5	1	.....	7	5	3	4	.....	.....
14	Tuberculous meningitis	10	.....	2	.....	1	.....	2	.....	.....	.....	.....	.....
15	Other forms of tuberculosis	3	.....	.....	.....	.....	.....	1	.....	.....	.....	1	.....
16	Cancer, malignant tumor	59	2	2	.....	1	1	.....	1	2	1	2	1
17	Simple meningitis (except cerebro-spinal meningitis).	5	.....	.....	.....	.....	1	1	.....	.....	.....	.....	1
17a	Cerebro-spinal meningitis	6	.....	.....	.....	1	.....	2	.....	.....	.....	.....	.....
18	Apoplexy and softening of the brain.	36	.....	.....	1	2	.....	2	.....	2	1	1	2
19	Organic heart diseases	99	3	7	4	5	3	2	3	2	1	2	3
20	Acute bronchitis	1	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....
21	Chronic bronchitis	3	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	41	2	2	1	.....	.....	6	3	2	2	.....	2
22a	Broncho-pneumonia	21	.....	2	.....	1	3	3	.....	.....	.....	.....	.....
23	Other respiratory diseases	9	.....	2	1	.....	.....	1	.....	.....	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	4	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
25	Diarrhea and enteritis (under two years).	85	.....	4	1	1	1	5	1	5	1	2	.....
26	Appendicitis and typhlitis	11	1	.....	.....	.....	.....	1	.....	.....	1	.....	.....
27	Hernia, intestinal obstruction,	3	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
28	Cirrhosis of liver	3	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....
29	Bright's disease and nephritis	52	.....	.....	1	2	2	1	1	1	1	2	2
30	Diseases of women (not cancer),	8	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	5	.....	1	.....	.....	.....	.....	.....	1	.....	1	.....
32	Other puerperal diseases	6	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	65	5	4	1	1	1	4	1	.....	2	1	1
34	Old age	4	.....	1	1	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	75	4	5	2	1	.....	5	4	2	4	3	4
36	Suicide	8	.....	.....	.....	.....	.....	.....	1	.....	.....	1	.....
37	Other diseases	150	4	8	3	4	4	6	3	7	3	1	5
38	Ill defined causes	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
	Total deaths under one year	201	8	12	3	6	5	16	2	6	6	4	3

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number.
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
28	30	23	30	23	33	34	34	53	32	28	28	31	28	14	2	123	10	....
12.96	16.41	11.18	16.34	9.93	14.20	17.40	12.19	10.08	11.67	10.65	10.12	9.02	11.49	10.33	....	....	....	....
19.85	31.71	18.69	12.63	15.53	23.60	24.18	21.49	20.32	15.33	10.42	12.25	12.60	14.43	.....	....	....	....	....
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	....	....	...	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	4
.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....	....	....	...	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	6
.....	.....	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	....	....	...	7
1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	1	...	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	9
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	....	....	...	12
4	3	6	3	3	4	4	4	4	4	2	6	4	2	.....	....	5	1	13
.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....	.....	1	....	2	...	14
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	15
3	2	2	2	1	3	1	4	6	5	.....	1	1	3	2	....	10	...	16
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	1	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	2	...	17a
2	1	.....	1	3	2	1	2	3	2	3	.....	1	2	1	....	1	...	18
2	1	5	5	3	5	4	2	8	5	3	4	4	5	.....	....	8	...	19
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	20
.....	.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....	.....	....	....	...	21
2	.....	.....	3	2	.....	.....	3	2	.....	2	.....	1	2	1	....	3	...	22
.....	1	.....	.....	.....	.....	2	.....	.....	1	1	1	2	.....	.....	....	4	...	22a
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	1	.....	1	....	2	...	23
1	1	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	....	....	...	24
2	5	2	2	1	6	4	4	5	.....	.....	1	2	4	3	....	21	2	25
.....	1	.....	.....	.....	.....	2	.....	1	.....	.....	1	.....	.....	.....	....	3	...	26
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	27
.....	1	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	....	...	28
1	.....	3	3	4	.....	3	3	3	2	2	3	1	2	.....	....	9	...	29
1	.....	.....	1	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	4	...	30
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	1	.....	.....	.....	.....	....	....	...	31
1	.....	.....	.....	.....	1	.....	.....	1	.....	.....	.....	1	.....	.....	....	1	...	32
3	1	1	1	4	5	2	1	5	3	1	.....	4	1	1	....	11	...	33
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	1	.....	....	....	...	34
1	3	1	2	.....	5	4	1	2	.....	1	2	3	2	1	1	10	2	35
.....	2	.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....	....	1	1	36
4	7	3	5	1	2	4	6	11	5	9	8	6	3	3	....	22	3	37
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	38
6	7	4	5	5	11	7	4	12	5	3	2	10	6	5	....	36	2	

VITAL STATISTICS.

July Infant Mortality.

Detailed List Class Number.	Causes of Death.	July Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	201	280	42	8	7	13	8	7	5	23	10	37	24	17	35	88	36
	Male	116	165	29	3	5	5	4	5	3	13	5	21	16	7	24	46	18
	Female	85	115	13	5	2	8	4	2	2	10	5	16	8	10	11	42	18
	White	196	271	40	8	6	13	8	7	5	22	10	35	24	17	35	85	36
	Colored	5	9	1	...	1	...	...	...	...	1	...	2	...	...	.....	3	...
1	Typhoid fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
5	Smallpox	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
6	Measles	1	1	...	...	...	...	...	...	...	...	...	...	...	1	.....	1	...
7	Scarlet fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
8	Whooping cough	4	3	...	...	...	...	...	...	...	1	...	3	...	...	1	3	...
9	Diphtheria and croup	.....	6	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
10	Influenza	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
14	Dysentery	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
18	Erysipelas	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
19	Other epidemic diseases	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
20	Pus-infection and septicemia	1	1	...	...	...	...	...	...	...	...	...	1	...	...	.....	1	...
24	Tetanus	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
28	Tuberculosis of the lungs	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
29	Acute miliary tuberculosis	2	.....	...	...	...	...	...	...	...	...	...	...	1	1	1	1	1
30	Tuberculous meningitis	1	3	...	...	...	...	...	...	...	...	...	1	...	...	1	.....	...
31 35	Other forms of tuberculosis	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
36	Rickets	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
37	Syphilis	3	6	...	...	...	1	...	...	...	2	...	...	...	...	1	1	...
38	Gonococcus infection	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
61	Simple meningitis	.....	6	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
61a	Cerebro-spinal fever	.....	2	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
63a	Acute poliomyelitis	1	.....	...	...	...	...	...	...	...	...	...	1	...	...	1	.....	...
71	Convulsions	2	1	...	...	...	...	...	...	...	1	...	...	...	1	1	1	...
76	Diseases of the ears	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
79	Organic diseases of the heart	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
89	Acute bronchitis	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
91	Broncho-pneumonia	9	18	...	...	1	1	...	...	...	...	2	...	3	2	2	5	2
92	Pneumonia	5	11	...	...	...	1	1	1	...	...	...	...	1	1	2	1	...
93	Pleurisy	1	1	...	...	...	...	...	...	...	...	...	...	...	1	.....	1	..
103	Other diseases of stomach	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
104	Diarrhea and enteritis	73	114	...	...	...	1	1	1	1	10	6	27	18	8	19	52	18
108	Appendicitis and typhlitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...

July Infant Mortality.— *Concluded.*

Detailed List Class Number.	Causes of Death.	July Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
109	Hernias, intestinal obstruction,	1	2	...	...	...	1	...	...	...	...	...	...	...	...	...	...	1
117	Simple peritonitis	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
119	Acute nephritis	1	...	...	...	...	...	...	...	...	...	...	1	...	...	...	1	...
143	Furuncle	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
144	Acute abscess	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
145	Other diseases of skin, etc.	2	...	...	...	...	...	...	...	...	...	...	2	...	...	...	2	1
150*a*	Hydrocephalus	...	18	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
b	Congenital malformations of heart.	5		2	...	...	...	1	...	...	...	1	1	...	...	...	2	...
c	Other malformations	3	...	1	1	...	1	...	...	...	...	...	...	...	...	...	...	2
151*a*	Premature birth	44	48	23	6	3	3	1	3	2	2	1	...	...	...	2	6	6
b	Congenital debility	12	...	1	...	...	1	1	2	...	6	...	...	...	1	1	8	3
152*a*	Injuries at birth	12	11	10	...	1	...	1	...	...	...	...	...	...	...	...	...	...
b	Other causes peculiar to early infancy.	12	...	5	...	1	2	2	...	1	1	...	...	...	...	1	1	1
167	Burns (conflagrations excepted).	1	...	...	...	...	...	...	...	1	...	...	...	...	...	1	...	...
168	Absorption of deleterious gases,	1	...	...	...	...	1	...	...	...	...	...	...	...	...	...	...	...
172	Traumatism by fall	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
182, 184	Homicide	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
187, 189	Ill-defined diseases	...	5	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
	Other causes	4	16	...	1	1	...	...	...	...	...	...	...	1	1	1	1	1
	Breast fed *	35	39	...	...	...	...	...	3	3	7	1	9	8	4	35	...	2
	Bottle fed *	88	184	...	...	...	...	...	4	2	16	9	28	16	13	...	88	24
	Nonresidents	36	35	5	1	...	3	1	...	1	4	2	9	6	4	2	24	36

* Aged two weeks and over.

Additional Deaths for Other Months.

June, 1912.— 1 male; cerebral hemorrhage; white; aged 69; married; residence, Ward 12; born in United States; mother born in United States.

1 female; organic disease of the heart; white; aged 40; condition unknown; residence unknown; born in United States; birthplace of mother unknown.

1 male; broncho-pneumonia; white; aged 55; married; nonresident; born in England; birthplace of mother unknown.

1 female; alcoholism; white; aged 36; single; residence, Ward 8; birthplace unknown; birthplace of mother unknown.

1 male; alcoholism; white; aged 49; condition unknown; residence unknown; birthplace unknown; birthplace of mother unknown.

1 female; disease of stomach; white; aged 81; widow; residence, Ward 16; born in United States; mother born in United States.

1 female; diarrhea and enteritis; under 2 years; white; aged 6 months; single; residence, Ward 2; born in United States; birthplace of mother, Ireland.

1 female; accidents of pregnancy; white; aged 28; single; nonresident; birthplace, Canada; birthplace of mother, Canada.

1 female; prematurity; white; aged 2 weeks; single; residence, Ward 26; born in United States; mother born in United States.

1 female; other acute poisonings; white; aged 36; married; residence, Ward 1; born in Canada; mother born in Canada.

1 male; absorption of deleterious gases; white; aged 49; single; residence, Ward 14; birthplace, Ireland; birthplace of mother, Ireland.

1 female; traumatism by fall; white; aged 87; widow; residence, Ward 11; born in United States; mother born in United States.

1 male; fractures (cause not specified); white; aged 29; condition unknown; nonresident; birthplace unknown; birthplace of mother unknown.

April, 1912.— 1 stillbirth.

DIVISION OF COMMUNICABLE DISEASES.

Medical Inspectors.

New cases visited:	
Diphtheria:	
a. Isolation	33
b. Diagnosis	5
Scarlet fever:	
a. Isolation	14
b. Diagnosis	2
c. Release	12
Measles	
a. Isolation	34
b. Diagnosis	6
Varicella:	
a. Isolation	45
b. Diagnosis	5
Epidemic cerebro-spinal meningitis	7
Anthrax	0
Ophthalmia neonatorum	7
Tuberculosis	58
Deaths investigated	14

Nurses.

New cases visited:	
Diphtheria	77
Scarlet fever	31
Measles	299
Varicella	45
Typhoid fever	33
Whooping cough	77
Ophthalmia	84
Mumps	13
Cerebro-spinal meningitis	6
Trachoma	1
Malaria	10
Old cases visited	522
Release cultures taken for diphtheria	52

Disinfections.

Diphtheria	72
Scarlet fever	37
Tuberculosis	209
Infected bedding	1 lot
Infected books, etc.	2 lots
Infected clothing, etc.	3 lots
Infected carriages	2

Forcible Removals.

Tuberculosis	4
Specific disease	2
Scarlet fever	1
Ophthalmia neonatorum	1

July, 1912. **Cases Reported.**

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum.
1	....	....	....	....	....	2	....	....	....	....	2	2	2
2	....	....	....	....	1	4	....	....	1	....	11	....	1
3	....	....	....	....	....	....	....	....	....	....	2	....	5
4	....	....	....	....	....	3	....	....	....	....	2	1	1
5	....	....	....	....	....	1	....	....	....	....	5	....	1
6	....	....	....	....	2	10	....	....	....	....	18	2	9
7	....	....	....	....	....	2	....	....	....	....	21	....	4
8	....	....	....	....	2	4	....	....	....	....	24	....	13
9	....	....	....	....	1	1	....	....	....	....	26	....	7
10	....	....	....	....	....	....	....	....	1	....	8	1	....
11	....	....	....	....	....	....	....	....	....	....	2	....	1
12	1	....	....	....	....	5	....	....	4	....	10	....	1
13	....	....	....	....	....	4	....	....	....	....	14	1	3
14	....	....	....	....	....	1	....	....	....	....	5	....	3
15	....	....	....	....	....	....	....	....	1	....	3	1	4
16	....	....	....	....	....	2	....	....	....	....	6	....	4
17	....	....	....	....	....	6	....	....	....	....	13	....	6
18	....	....	....	....	....	....	....	....	1	....	15	....	3
19	....	....	....	....	....	9	....	....	....	....	23	1	3
20	....	....	....	....	....	5	....	....	....	....	18	1	4
21	....	....	....	....	....	5	....	....	....	....	31	3	4
22	1	....	....	....	....	8	....	....	1	....	14	....	1
23	....	....	....	....	....	2	....	....	1	....	4	....	1
24	....	....	....	....	....	3	....	....	....	....	8	....	1
25	....	....	....	....	....	....	....	....	....	....	8	....	2
26	....	....	....	....	....	....	....	....	....	....	6	....	....
Total	2	....	....	....	6	77	....	....	10	....	299	13	84
Unknown	....	....	....	....	....	....	....	....	....	....	....	....	....
Nonresidents	....	....	....	....	1	1	....	....	....	....	3	....	3
Grand total	2	....	....	....	7	78	....	....	10	....	302	13	87
Corresponding month last year	2	....	1	....	4	113	....	....	4	....	191	2	81

COMMUNICABLE DISEASES.

Cases Reported. **July, 1912.**

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
2	....	....	....	....	9	2	3	....	2	2	....	.....
1	....	....	....	....	11	....	3	....	5	8	....	 2
.....	....	....	....	....	6	1	1	....	1	1	....	 3
.....	....	....	....	....	4	....	1	....	2	2	....	 4
.....	....	....	....	....	5	3	1	....	4	3	....	 5
3	....	....	....	....	17	3	....	....	6	16	....	 6
.....	....	....	....	....	22	....	....	....	.....	7	....	 7
7	....	....	....	....	14	1	2	....	4	1	....	 8
2	....	....	....	....	17	2	1	....	.....	5	....	 9
.....	....	....	....	....	10	....	2	....	2	2	....	10
.....	....	....	....	....	5	1	3	....	.....	.....	....	11
4	....	....	....	....	4	....	1	....	1	.....	....	12
.....	....	....	....	....	8	....	....	....	1	2	....	13
1	....	....	....	....	10	....	3	....	4	5	....	14
1	....	....	....	....	7	....	2	....	2	3	....	15
.....	....	....	....	....	13	1	....	....	.....	.....	....	16
.....	....	....	....	....	12	1	1	....	.....	2	....	17
1	....	....	....	....	17	....	....	....	.....	2	....	18
1	....	....	....	....	8	2	....	....	2	3	....	19
3	....	....	....	....	13	2	....	....	4	.....	....	20
1	....	....	....	....	14	2	1	....	1	.....	....	21
.....	....	....	....	....	7	2	1	....	1	1	....	22
2	....	....	....	....	4	....	1	....	2	1	....	23
1	....	....	....	....	11	2	3	....	.....	6	....	24
.....	....	....	....	....	5	....	1	....	.....	5	....	25
1	....	....	....	....	7	1	2	....	1	.....	....	26
31	....	....	....	....	260	26	33	....	45	77	....	.....Total
.....	....	....	....	....	3	....	....	....	.....	.....	....	.....Unknown
2	....	....	3	....	13	9	1	....	.....	.....	....	.....Nonresidents
33	....	....	3	....	276	35	34	....	45	77	....	.....Grand total
60	....	....	....	....	226	....	30	....	39	64	....	Corresponding month last year.

Physical Examination of Licensed Minors.

There were 858 children between the ages of 14 and 16 years examined during the month. Four hundred and sixty-three were found without defects and 395 with defects as follows:

Defective eyesight	53	Orthopedic defects	2
Hypertrophied tonsils	128	Bronchitis	6
Defective teeth	293	Skin disease	11
Cardiac disease	15	Miscellaneous	1
Defective palate	3	One certificate was withheld.	

3. Post-Natal Work.

Cases	4,838	Bottle-fed babies	574
Visits	6,206	Both feedings	490
Breast-fed babies	3,774		

Defective Conditions Noted.

Cervical glands	2	Whooping cough	6
Skin disease	46	Orthopedic defects	2
Ophthalmia	5	Otitis media	2
Measles	3	Miscellaneous	6

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:					
Positive for diagnosis				39	
Positive for release				34	
Negative for diagnosis				391	
Negative for release				85	
"No growth" cultures				6—	555
TUBERCULOSIS:					
Positive				116	
Negative				281	
Unsatisfactory				0—	397
TYPHOID:					
Positive				12	
Negative				187	
Atypical				4—	203
GLANDERS:	Strauss.	C. F.	Ag.		
Positive	1	16	14	31	
Negative	8	9	11	28	
Unsatisfactory	2	0	0	2	
Atypical	0	1	1	2—	63
GONORRHEA:					
Positive				49	
Negative				95	
Unsatisfactory				0—	144
GONORRHEAL OPHTHALMIA:					
Positive				4	
Negative				49	
Unsatisfactory				0—	53
OTHER EXAMINATIONS:					
*Positive				16	
Negative				161	
Unsatisfactory				1—	178
BACTERIOLOGICAL MILK EXAMINATIONS				640	640
Bacteriological ice cream examinations				21	21
Total				2,254	2,254

SPECIAL WORK:
Longevity of tubercle bacilli in sputum and cow feces.
Examination of cow feces for tubercle bacilli.
Preparation for the complement fixation for syphilis and gonorrhea.
Cultural tests of streptococci.

* Organisms: paratyphoid, syphilis, spirochætæ, typhoid urine and feces, typhoid conradi, K-L Vir., dysentery, malaria, G-U. T. B. rats for plague identification of rats autopsied in July, 1912; mus novegicus (101); mus ratters (13); mus musculus (5).]

INSPECTION OF MILK, VINEGAR, ETC.

Examination as to Statute Requirements.

Samples examined,	milk from stores	439
" "	milk from wagons	632
" "	milk brought in by citizens	62
" "	milk for bacteriological examination	640
" "	bacteriological ice cream	21
" "	vinegar	80
" "	butter and cheese	3
Total samples		1,877

REPORT OF DAIRY DIVISION FOR JULY.

INSPECTION OF DAIRIES.

Satisfactory * on first inspection	118	
Satisfactory on later inspection	93	
	—	211
Unsatisfactory on first inspection	109	
Unsatisfactory on later inspection	43	
	—	152
Total number of inspections		363
Dairies having milk rooms	261	
Dairies without milk rooms	102	
Number of cattle inspected	8,724	
Number of dairies prohibited shipping milk to Boston because of insanitary conditions of premises	20	

Four of the six dairy inspectors have been stationed at the several milk receiving stations around Boston during this month and a record kept of the milk inspected from July 23 to the end of the month, as follows:

Receipts.	Quarts.	*Shipments.*	Quarts.	*Pasteurized.*	Quarts.
Milk	2,104,155	Milk in bottles,	783,325	Milk	1,802,187
Cream	191,361	Milk in cans	1,235,400	Cream	191,361
Skimmed milk	71,624	Cream in bottles,	29,624	Skimmed milk	71,624
Certified milk	8,987	Cream in cans	134,988		
Specially inspected milk,	3,200	Skimmed milk	64,893		
		Certified milk	8,901		
		Specially inspected milk	3,000		

Average temperature of milk, in the car, 46 degrees Fahrenheit.

A sanitary inspection of the receiving stations was also made and insanitary conditions noted and corrected.

* "Satisfactory" means having a score of at least 45 per cent by the government score card. Only two inspectors have been inspecting dairies this month.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	237	Cattle condemned (1 and parts),	1,680 lbs.
Calves inspected	498	Calves condemned (2)	75 lbs.
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	3,319	Swine condemned (1 and parts),	1,505 lbs.

INSPECTION OF PROVISIONS.—ARTICLES CONDEMNED.

Meats.

Veal (tainted)	596 lbs.	Poultry (tainted)	230 lbs.
Mutton (tainted)	42 lbs.	Bear meat (tainted)	131 lbs.
Beef (tainted)	455 lbs.	Pigeons (tainted)	150 lbs.
Pork (tainted)	33 lbs.		

Miscellaneous.

Vegetables (decayed)	4½ bush.	Fruit (decayed)	54 bush.

SANITARY INSPECTION DIVISION.

New reports	2,955
Reinspections	5,633
New tenement house reports	33
Nuisances reported	3,925
Legal notices	520
Court cases	5
Fines	$35
Tenements vacated	2
Stable permits granted	5
Stable hearings	5
Dump permits granted	1
Dump permits revoked	1

QUARANTINE.

Vessels inspected at quarantine	84
Total immigrants arriving in Boston	5,231

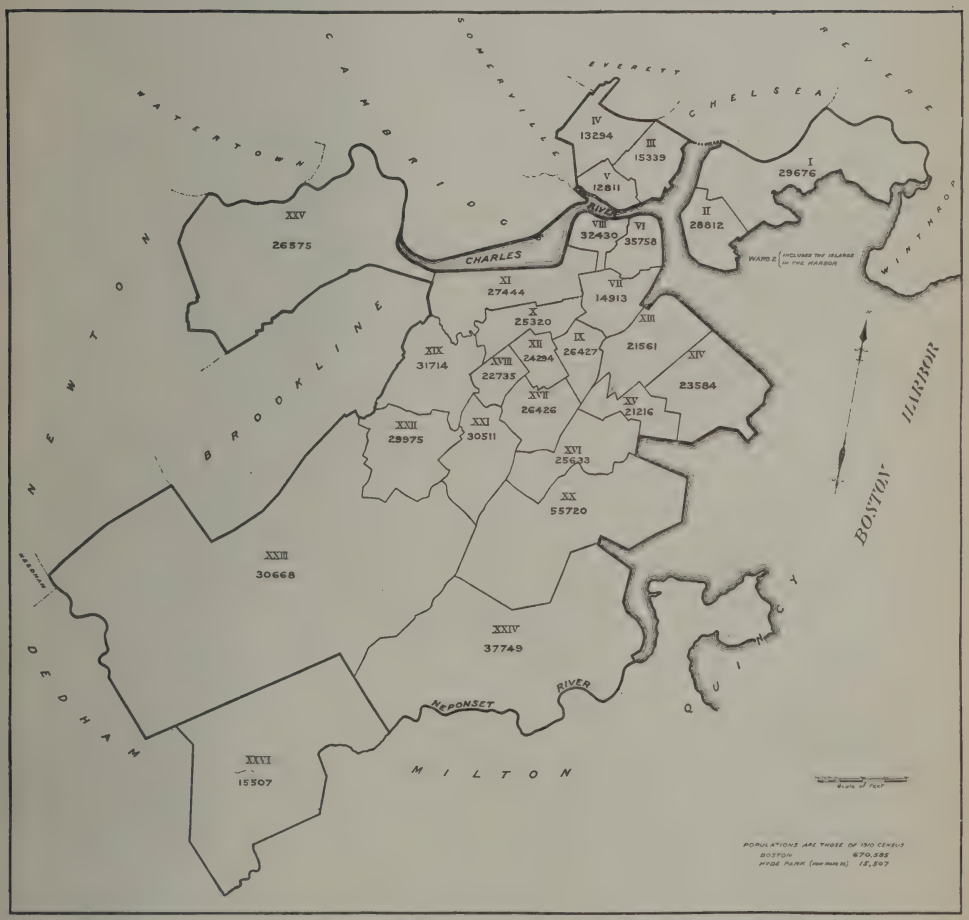
MONTHLY METEOROLOGICAL SUMMARY.

Taken at Weather Bureau, Boston, July, 1912.

Day.	Temperature, Degrees Fahrenheit.			Relative Humidity.	Daily Precipitation.	Actual Hours Sunshine.	Wind.		
	Maximum.	Minimum.	Mean.				Average Hourly Velocity. (Miles.)	Maximum Velocity. (Miles.)	Prevailing Direction.
1.....	71	56	64	44	0	15 2	8.5	16	S. E.
2.....	85	61	73	49	0	15.2	13.3	17	W.
3.....	92	65	78	52	0	15.2	10.7	20	W.
4.....	94	67	80	68	0	15.2	11.1	21	S. W.
5.....	91	68	80	67	0	15.1	12.8	20	S. W.
6.....	90	68	79	60	0	15.1	12.6	22	S. W.
7.....	93	70	82	62	0	15.1	11.6	18	S. W.
8.....	94	72	83	73	T	12.0	9.0	16	S. W.
9.....	99	78	88	55	0	15.1	8.1	19	W.
10.....	97	76	86	64	.02	13.4	11.0	28	W.
11.....	90	70	80	78	1.14	7.2	7.6	27	W.
12	72	64	68	90	T	10.2	6.9	15	E.
13.....	81	63	72	86	0	10.3	7.3	17	E.
14.....	81	68	74	87	T	6.5	8.5	16	S. W.
15.....	85	71	78	76	0	5.1	11.1	21	S. W.
16.....	92	69	80	82	T	13.1	9.7	18	S. W.
17.....	70	64	67	72	0	11.8	8.0	16	N. E., E.
18.....	70	63	66	95	2.52	0.3	5.8	16	S.
19.....	79	62	70	64	T	10.7	13.8	29	N. W.
20.....	79	57	68	51	0	13.1	10.4	19	W.
21.....	70	61	66	86	1.03	0	8.8	15	S. W.
22.....	79	62	70	72	0	8.8	13.9	24	N. W.
23.....	73	57	65	45	0	13.2	15.5	27	N. W.
24.....	79	57	68	42	0	14.7	12.5	25	N. W.
25.....	75	58	66	52	.0	13.3	6.9	—	N. W.
26.....	79	62	70	69	0	10.0	6.2	12	W.
27.....	78	63	70	51	0	11.6	9.7	18	N. W.
28.....	84	58	71	50	0	11.8	10.0	19	W.
29.....	78	67	72	70	.45	3.8	8.7	17	W.
30.....	70	61	66	88	0	8.7	7.4	14	E.
31.....	72	61	66	84	T	8.6	5.6	19	N. E., E.
Totals.....	—	—	—	—	5.16	339.4	—	—	—
Means.....	82.0	64.5	73.1	67.2	0.17	7.4	9.8	—	S. W.

Latitude 42 degrees 21 minutes. Longitude 71 degrees 4 minutes.

BOSTON WARD MAP.



Vol. 1 AUGUST, 1912 No. 8

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF THE

CITY OF BOSTON

	Page
The Boston Health Department	203
Vital Statistics, August, 1912	207
Monthly reports	216

CITY OF BOSTON
PRINTING DEPARTMENT
1912

ORGANIZATION OF THE HEALTH DEPARTMENT

FRANCIS X. MAHONEY, M. D., *Chairman.*
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

PRINTED BY LABEL
TRADES UNION LABEL COUNCIL
BOSTON MASS.

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, AUGUST, 1912. NO. 8.

THE BOSTON HEALTH DEPARTMENT.

BY F. H. SLACK, M. D.

Secretary, Boston Health Department.

The Boston Board of Health is composed of three members, one of whom must be a physician, and the term of service of each member is for three years, one appointment being made each year. Members of the Board are appointed by the Mayor and must be approved by the State Civil Service Commission. The Board organizes annually on the first Monday of May and chooses one of its members as chairman for the ensuing year. Excepting on Sundays and holidays, it holds daily meetings, and the members are on duty at the central office during the regular hours of the department.

The Board has its secretary, assistant secretary, stenographer, bookkeeper, clerks, etc., of the central office staff, all of whom are appointed from civil service lists, as are with but few exceptions all the employees of the department.

The work of the department is separated into various divisions, each of which has its chief, who is held responsible for his subordinates and for the work of his division.

The Division of Sanitary Inspection comprises a chief, assistant chief, three stenographers, three clerks, thirty-four sanitary inspectors, one inspector of gas fixtures, ten police officers and three constables. The convenience stations throughout the city are also under the care of this division, and at present employ eleven janitors and nine matrons. The number is soon to be largely increased, as several new convenience stations are now in process of erection. This division has charge of the various sanitary inspections of the Health Department, such as the inspection of tenement houses in the city, which is required by law semi-annually; inspection of lodging houses, yards and areas, bakeries, milk stores,

barber shops, etc. To it also is designated the investigation of the many complaints, anonymous and otherwise, as to sanitary conditions throughout the city.

The Division of Communicable Diseases employs a chief, two medical inspectors, nine nurses, two clerks and a stenographer. It also has oversight of the disinfecting corps, which comprises a chief disinfector and seven assistants. To this division come the reports of contagious diseases which physicians are legally obliged to make. It is responsible for the proper isolation of these cases throughout the infective period, and if such cannot be obtained at home, for the removal of cases to the hospital. The tabulation of the physicians' reports is so arranged that any unusual outbreak of disease is quickly noted. In such an outbreak it is the duty of this division, not only to see that proper quarantine measures are enforced, but also where possible to trace and eliminate the cause of the outbreak.

Closely associated with the work of this division is the Detention Hospital, a commodious building under the care of a superintendent and matron, for the care of such occasional or, in case of an epidemic, overflow cases as cannot be taken by the City Hospital. In any case where a person dies without a physician in attendence, a personal visit is made by a medical inspector from this division and a probable diagnosis made before granting a permit for burial.

The Division of Child Hygiene consists of a chief, assistant chief, eighty-four school physicians, eleven nurses and two stenographers.

The chief duty of this division is the medical inspection of school children. It is required that each school be visited daily by the physician in charge, during the early part of the morning session, and that a daily report be made in writing by each school physician to the chief of the division. A thorough physical examination of each scholar once a year is required by law. In this work the school physicians are assisted by the school nurses, who are under the control of the School Committee. The law permits children fourteen years of age to leave school and engage in some gainful pursuit, but requires that each such child shall pass a physical and mental examination. The physical examination of these minors is made by the examining physician of the Child Hygiene Division, with the assistance of a nurse. The nurses of this division, each in her assigned territory, visit prospective mothers and mothers of young infants, giving advice applying to the prenatal condi-

tion and the care of the child after birth. This oversight extends to the school age, so that this division is responsible for the well being of the children in the city from before birth until the child leaves school.

The Division of Vital Statistics receives all death certificates and has charge of the proper compilation of the information contained on the same. This division also edits the monthly bulletin of the department. It employs a chief and four clerks.

The Bacteriological Laboratory is situated at 30 Huntington avenue, and makes free diagnoses of all bacterial or protozoan diseases causative factors of which have been determined. Its staff consists of a director, assistant director, three bacteriologists, two stenographers, a media maker with two assistants, and a messenger. Examinations comprise diphtheria, tuberculosis, typhoid, malaria, venereal diseases, glanders, rabies, etc. Outfits for specimens may be obtained at culture stations established at convenient distances throughout the city in drug stores, and these stations also are responsible for the return to the laboratory of specimens committed to their care. One bacteriologist gives all his time to the bacterial examinations of milk samples. As much time as is available from routine work is utilized in the carrying on of various research problems. The laboratory is open daily, routine diagnostic examinations being made on Sundays and holidays. Although the laboratory closes at 6 p. m., arrangements are made for the reception of specimens and the incubation of diphtheria cultures up to 11 p. m.

The Bureau of Inspection of Milk and Vinegar.— This division safeguards the purity of the milk supply within the city and is also responsible for the genuineness of vinegar, butter, etc. It buys and seizes samples at receiving stations and in wagons, stores, and restaurants. Its chemist examines the same and the chief inspector not only directs the work of this division, but also prosecutes all court cases. This laboratory is also situated at 30 Huntington avenue, and the force employed consists of a chief inspector, a chemist, a clerk, a stenographer, and three collectors.

The Division of Dairy Inspection consists of a chief, a clerk, and seven inspectors. These inspectors, each in his allotted territory, which is changed from time to time, visit and score (using United States score card) all dairies supplying milk to Boston. Their territory extends throughout New England, into eastern New York, and lower Canada. Dairies are required to make necessary sanitary improvements or the sale of milk from the same is forbidden in Boston.

The Division of Food Inspection has six inspectors on constant duty in the market districts, with authority to seize and condemn tainted or decayed meats, vegetables, fruit, etc. It has also two inspectors on duty at the Brighton Abattoir, the only slaughter house for animals in the city, inspecting animals intended for slaughter.

The Division of Communicable Diseases of Animals has charge of the veterinary inspection of animals in the city and the control of contagious diseases among the same, especially glanders and rabies.

The Quarantine Division is in charge of the Port Physician. It is his duty to visit all incoming vessels from foreign or infected ports, to see that the federal and local quarantine laws are observed, and to remove from such vessels to the quarantine station all infectious or suspicious cases. This station, besides the home of the superintendent, has numerous buildings for the care of cases kept on account of communicable disease or for observation. Although the number of such patients is usually few, over a thousand can be accommodated on short notice. The quarantine Steamer "Vigilant" and sixteen persons are regularly employed in connection with the quarantine inspection, and the station at Gallop's Island.

The Board of Health appoints the City Physician and Assistant City Physician; the former examining applicants for appointment or retirement for the Fire and Police Departments; the latter having charge of free vaccinations and also serving as physician for the County Jail.

The Board also employs a Dermatologist, who examines cases of obscure skin diseases referred by the Board or by any of the school physicians.

The Inspector of Peddlers, with his Assistant, has charge of issuing peddlers' licenses and is responsible for the proper condition of peddlers' wagons throughout the city, of which he makes a monthly inspection.

Thus, briefly are summarized the chief activities of this department, the work of which is constantly increasing in scope and usefulness, a work that deserves and, wherever understood, has the hearty cooperation of every intelligent citizen.

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF AUGUST, 1912.

Boston had 883 deaths in August, compared with 902 for August of last year; and a death rate of 14.44 against 15.42 for August, 1911.

Of deaths from reportable diseases the principal decrease was measles, 3; and the principal increases were typhoid fever, 3; tuberculosis (all forms), 3; diphtheria, 2 and whooping cough, 2.

Other important differences were as follows:

August, 1912, decreases compared with August, 1911:

Diarrhea and enteritis (under 2 years)	54
Other diseases	20
Broncho pneumonia	7
Appendicitis	5

August, 1912, increases compared with August, 1911:

Congenital debility, etc	21
Organic heart disease, Bright's disease and nephritis	12
Apoplexy	7
Violent deaths	7

There were 36 less deaths under 1 year than in August, 1911, and 53 less under 5 years.

Ward 21 had the lowest rate, 5.84, and Ward 4 the highest, 17.25. Deaths of nonresidents were 128 against 108 in August, 1911.

Ninety-five cases of diphtheria were reported against 100 in August, 1911, and only 29 cases of scarlet fever against 63 last year. On the other hand there were 118 cases of measles against 95 in August, 1911, 70 cases of typhoid against 55 last year and 107 cases of whooping cough against 63 last year.

There were 224 deaths under 1 year, which is 94 less than the average for August for the preceding five years. Moreover 37 deaths of nonresidents are included in the 224 total. Sixty-eight of these deaths were due to premature birth, congenital debility, malformations and other diseases peculiar to early infancy; 115 to diarrhea and enteritis; 17 to pneumonia; 10 to reportable diseases; and 14 to other causes. Of these deaths under 1 year, Ward 6 furnished the largest number, 19, and Ward 1 came next with 12. One hundred and seventy-five were over 2 weeks old, and of these 135 were bottle fed.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
* Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	137.06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	‡298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston January 1, 1912, and became Ward 26. Under "Boston." in the above table, Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau.

‡ An infant asylum is located in this ward.

VITAL STATISTICS.

August. General Summary.

	1912.	1911.
Total deaths	883	902
Population, estimated*	720,031	688,912
Death rate per 1,000	14.44	15.42
Deaths of nonresidents	128	108
Corrected death rate†	12.35	13.57

*Population estimated by arithmetical method used by Census Bureau.
†Nonresidents not included.

August, 1912. Statement of Deaths.

Total number (stillbirths excluded)	883
Sex.	
Males	455
Females	428
Condition.	
Single	454
Married	273
Widowed	139
Divorced	4
Unknown	13
Color.	
White	854
Black (negro or mixed)	26
Chinese	2
Indian	1
Deaths of children:	
Under one year	224
Under two years	257
Under five years	277
Stillbirths during the month,	62

Nativity.	
United States	565
Ireland	130
England and Wales	21
Scotland	5
Germany	9
Canada	65
Italy	27
Russia and Poland	22
Sweden and Norway	13
France	2
Other countries	12
Unknown	12
Nativity of Mothers.	
United States	236
Ireland	279
England and Wales	25
Scotland	9
Germany	11
Canada	79
Italy	67
Russia and Poland	60
Sweden and Norway	13
France	4
Other countries	22
Unknown	78

Abridged List Class Number.	Causes of Death.	Totals. August, 1912.	Totals. August, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes {1912 / 1911}	883 /	..... / 902	224 / 260	33 / 47	13 / 10	7 / 7	2 / 8	279 / 332	15 / 10	8 / 7	21 / 11
1	Typhoid fever	9	6	.....	1	1	.....	.....	2	1	.....	.....
3	Malarial fever	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	1	4	.....	1	.....	.....	.....	1	.....	.....	.....
6	Scarlet fever	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough	9	7	3	3	2	1	.....	9	.....	.....	.....
8	Diphtheria and croup	4	2	1	.....	2	.....	.....	3	.....	.....	.....
9	Influenza	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
11	Cholera nostras	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	4	2	3	.....	.....	.....	.....	3	.....	.....	.....
13	Tuberculosis of the lungs	73	69	1	.....	.....	.....	.....	1	1	1	4
14	Tuberculous meningitis	8	11	2	4	.....	1	.....	7	1	.....	.....
15	Other forms of tuberculosis	5	3	3	.....	.....	.....	.....	3	.....	.....	.....
16	Cancer, malignant tumor	66	67	.....	.....	.....	.....	.....	.....	.....	.....	.....
17	Simple meningitis (except cerebro-spinal meningitis).	3	.....	.....	.....	.....	.....	1	1	.....	.....	.....
17a	Cerebro-spinal meningitis	5	6	.....	.....	.....	.....	.....	.....	2	1	1
18	Apoplexy and softening of the brain,	38	31	.....	.....	.....	.....	.....	.....	.....	.....	.....
19	Organic heart diseases	117	91	.....	.....	.....	.....	.....	.....	1	3	5
20	Acute bronchitis	3	1	2	1	.....	.....	.....	3	.....	.....	.....
21	Chronic bronchitis	1	2	.....	1	.....	.....	.....	1	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	33	30	7	5	1	.....	.....	13	.....	.....	.....
22a	Broncho-pneumonia	16	23	10	1	.....	1	.....	12	.....	.....	.....
23	Other respiratory diseases	4	5	.....	.....	.....	.....	.....	.....	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	4	3	1	.....	.....	.....	.....	1	.....	.....	.....
25	Diarrhea and enteritis (under two years).	129	183	115	14	.....	.....	.....	129	.....	.....	.....
26	Appendicitis and typhlitis	9	14	.....	.....	.....	.....	1	1	2	1	2
27	Hernia, intestinal obstruction	9	8	1	.....	.....	.....	.....	1	.....	.....	1
28	Cirrhosis of liver	7	5	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	41	55	1	.....	.....	.....	.....	1	1	.....	.....
30	Diseases of women (not cancer)	6	3	.....	.....	.....	.....	.....	.....	.....	.....	1
31	Puerperal septicemia	4	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	7	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	54	33	54	.....	.....	.....	.....	54	.....	.....	.....
34	Old age	2	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	62	55	.....	1	2	2	.....	5	4	.....	6
36	Suicide	9	10	.....	.....	.....	.....	.....	.....	.....	.....	1
37	Other diseases	135	155	19	1	5	2	.....	27	2	2	.....
38	Ill-defined causes	5	6	1	.....	.....	.....	.....	1	.....	.....	.....

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex.		Abridged List Class Number.
															Males.	Females.	
28	35	35	45	45	54	56	38	37	68	43	42	23	9	2	455	428	
28	36	31	45	48	46	45	44	53	47	47	35	21	12	4	475	427	
.....	.....	.....	2	1	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	4	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	6
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	7	2	7
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	3	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	9
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	11
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	2	12
6	11	9	10	6	11	3	3	1	4	2	.....	.....	.....	.....	36	37	13
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	6	14
.....	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	3	15
1	.....	2	1	8	7	10	10	5	10	6	5	1	.....	.....	17	49	16
.....	.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	.....	17
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	3	2	17a
.....	1	1	.....	1	2	1	1	6	8	7	3	4	3	.....	19	19	18
1	1	5	6	7	8	13	6	7	18	10	14	6	5	1	57	60	19
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	2	20
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	21
2	.....	2	2	2	1	2	.....	2	1	1	3	1	.....	1	14	19	22
.....	.....	1	1	.....	.....	.....	.....	1	.....	1	.....	.....	.....	.....	6	10	22a
.....	.....	.....	1	.....	1	.....	.....	.....	.....	1	1	.....	.....	.....	4	.....	23
.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....	.....	1	.....	.....	1	3	24
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	68	61	25
2	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	7	2	26
.....	2	1	.....	.....	.....	1	1	.....	.....	1	.....	1	.....	.....	5	4	27
.....	.....	.....	.....	.....	1	1	1	1	2	1	.....	.....	.....	.....	3	4	28
1	.....	1	4	2	.....	4	4	5	3	3	9	2	1	.....	19	22	29
.....	1	.....	1	.....	1	1	.....	.....	.....	1	.....	.....	.....	.....	.....	6	30
3	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	31
2	3	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	7	32
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	32	22	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....	2	34
7	9	4	4	4	2	6	5	1	3	1	.....	1	.....	.....	55	7	35
.....	1	3	1	2	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	7	2	36
3	4	4	9	11	12	12	5	8	18	6	7	5	.....	.....	72	63	37
.....	1	.....	1	.....	.....	.....	1	.....	.....	1	.....	.....	.....	.....	4	1	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence.										
			1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	883	30	35	20	20	13	46	18	33	35	20	20
	Rates per 1,000 population ....{Aug., 1912	14.44	11.19	13.69	15.13	17.25	11.88	14.13	14.50	11.72	14.54	9.06	7.93
	{Aug., 1911	15.42	16.10	13.56	13.71	18.33	13.75	18.69	11.97	15.06	15.00	6.88	10.26
1	Typhoid fever	9	.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	1	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....
6	Scarlet fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough	9	1	.....	.....	.....	.....	.....	1	.....	.....	1	.....
8	Diphtheria and croup	4	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
9	Influenza	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
11	Cholera nostras	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	4	.....	.....	.....	.....	.....	2	.....	1	.....	.....	.....
13	Tuberculosis of the lungs	73	1	3	1	1	3	7	4	4	4	1	2
14	Tuberculous meningitis	8	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....
15	Other forms of tuberculosis	5	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
16	Cancer, malignant tumor	66	3	1	.....	3	1	.....	1	3	.....	1	2
17	Simple meningitis (except cerebro-spinal meningitis).	3	.....	.....	1	.....	.....	1	.....	.....	.....	.....	.....
17a	Cerebro-spinal meningitis	5	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
18	Apoplexy and softening of the brain.	38	1	.....	1	1	.....	.....	.....	.....	.....	2	1
19	Organic heart diseases	117	5	8	1	1	1	1	4	6	4	6	2
20	Acute bronchitis	3	.....	.....	.....	.....	.....	.....	.....	.....	1	1	.....
21	Chronic bronchitis	1	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	33	2	2	.....	.....	1	2	1	1	1	1	1
22a	Broncho-pneumonia	16	2	1	1	2	.....	3	.....	.....	1	.....	.....
23	Other respiratory diseases	4	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....
24	Diseases of the stomach (cancer excepted).	4	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
25	Diarrhea and enteritis (under two years).	129	7	4	6	3	2	14	2	3	7	.....	.....
26	Appendicitis and typhlitis	9	1	1	1	.....	.....	.....	.....	.....	1	.....	.....
27	Hernia, intestinal obstruction,	9	.....	.....	.....	.....	.....	.....	.....	1	2	.....	.....
28	Cirrhosis of liver	7	.....	.....	.....	.....	.....	2	.....	.....	1	.....	.....
29	Bright's disease and nephritis	41	2	2	1	.....	1	2	1	.....	1	1	1
30	Diseases of women (not cancer),	6	.....	.....	.....	.....	.....	1	.....	.....	.....	1	.....
31	Puerperal septicemia	4	.....	.....	.....	1	.....	.....	1	.....	.....	.....	.....
32	Other puerperal diseases	7	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....
33	Congenital debility and malformations.	54	2	2	2	2	.....	4	.....	2	1	2	3
34	Old age	2	.....	.....	1	.....	.....	1	.....	.....	.....	.....	.....
35	Violent deaths	62	1	2	1	1	.....	.....	.....	1	2	1	4
36	Suicide	9	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	1
37	Other diseases	135	2	4	2	4	3	3	2	9	7	1	3
38	Ill defined causes	5	.....	1	.....	.....	1	.....	1	1	.....	.....	.....
	Total deaths under one year	224	12	9	6	6	6	19	3	7	11	4	3

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number.
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
28	28	25	20	16	29	33	37	58	16	37	33	50	25	9	2	128	19	....
12.96	15.32	12.15	10.89	6.90	12.48	16.89	13.27	11.03	5.84	14.07	11.93	14.55	10.26	6.64	....	....	...	....
15.12	16.40	17.21	8.24	11.09	13.99	14.41	12.75	15.94	12.34	6.94	8.54	9.00	11.46	.....	....	....	...	....
2	1	.....	.....	.....	.....	.....	.....	2	.....	.....	.....	1	.....	.....	....	1	...	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	6
1	1	.....	1	.....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	....	1	...	7
.....	.....	.....	.....	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	1	...	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	9
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	11
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	....	....	...	12
2	2	5	3	3	1	4	1	1	.....	3	1	5	4	.....	....	4	3	13
.....	.....	.....	.....	.....	.....	.....	2	1	.....	.....	.....	.....	.....	.....	....	4	...	14
1	.....	.....	.....	.....	1	.....	.....	1	.....	.....	.....	.....	.....	.....	....	1	...	15
2	1	2	2	.....	1	2	2	8	4	5	7	4	1	1	....	9	...	16
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	17
.....	.....	.....	1	.....	.....	1	.....	.....	.....	.....	.....	1	.....	.....	....	1	...	17a
3	.....	1	.....	1	1	1	1	5	2	2	1	3	5	1	....	5	...	18
2	3	2	4	2	3	8	6	8	1	5	8	8	5	3	....	8	2	19
.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	20
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	21
1	.....	1	.....	.....	3	1	.....	4	1	1	1	3	.....	2	....	3	...	22
.....	.....	.....	.....	.....	.....	2	.....	.....	.....	.....	1	.....	.....	.....	....	2	1	22a
.....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	23
.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	2	...	24
3	10	3	.....	2	3	2	6	3	.....	3	6	7	2	.....	2	23	6	25
.....	.....	.....	1	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	2	...	26
.....	.....	.....	1	.....	1	1	.....	.....	.....	.....	.....	1	.....	1	....	1	...	27
.....	.....	1	.....	.....	.....	.....	.....	2	.....	.....	.....	.....	.....	.....	....	1	...	28
1	.....	1	1	.....	.....	3	1	6	.....	3	3	4	2	.....	....	4	...	29
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	....	2	...	30
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	....	....	...	31
.....	.....	.....	.....	.....	1	.....	1	1	.....	.....	.....	.....	.....	.....	....	3	...	32
3	.....	4	1	.....	.....	1	1	4	.....	5	1	3	1	1	....	9	...	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	34
.....	1	.....	2	1	4	2	3	2	3	2	2	1	3	.....	....	20	3	35
1	.....	1	.....	.....	.....	.....	1	.....	.....	.....	.....	1	.....	.....	....	2	1	36
6	6	3	2	5	9	5	8	9	5	7	2	7	1	.....	....	17	3	37
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	....	....	...	38
9	11	7	2	3	5	5	8	10	1	10	8	10	3	1	2	37	6	

VITAL STATISTICS.

August Infant Mortality.

Detailed List Class Number.	Causes of Death.	August Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	224	260	26	5	5	9	4	15	2	25	28	48	37	20	40	135	37
	Male	117	138	18	3	4	1	1	10	2	13	15	23	17	10	18	72	13
	Female	107	122	8	2	1	8	3	5	...	12	13	25	20	10	22	63	24
	White	217	255	25	5	5	8	4	14	2	24	28	47	35	20	39	131	36
	Colored	7	5	1	...	...	1	...	1	...	1	...	1	2	...	1	4	1
1	Typhoid fever	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
5	Smallpox	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
6	Measles	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
7	Scarlet fever	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
8	Whooping cough	3	4	...	...	...	...	...	...	...	1	...	...	...	2	2	1	...
9	Diphtheria and croup	1	...	...	...	...	...	...	...	...	...	...	...	...	1	...	1	...
10	Influenza	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
14	Dysentery	...	4	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
18	Erysipelas	3	1	...	...	...	...	...	1	...	...	...	...	2	...	2	1	...
19	Other epidemic diseases	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
20	Pus-infection and septicemia,	1	...	...	...	...	...	...	...	...	...	1	...	...	...	...	1	...
24	Tetanus	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
28	Tuberculosis of the lungs	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
29	Acute miliary tuberculosis	1	...	...	...	...	...	...	...	...	...	...	1	...	...	...	1	...
30	Tuberculous meningitis	2	5	...	...	...	...	...	...	...	...	...	2	...	...	1	1	1
31 35	Other forms of tuberculosis	3	...	...	...	...	1	...	...	...	1	...	...	1	...	1	1	1
36	Rickets	1	1	...	...	...	...	...	...	...	...	...	...	1	...	...	1	...
37	Syphilis	3	5	...	...	...	...	...	1	...	...	...	1	1	...	1	2	...
38	Gonococcus infection	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
61	Simple meningitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
61a	Cerebro-spinal fever	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
63a	Acute poliomyelitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
71	Convulsions	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
76	Diseases of the ears	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
79	Organic diseases of the heart,	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
89	Acute bronchitis	2	1	...	...	...	...	...	...	...	...	...	1	...	1	1	1	...
91	Broncho-pneumonia	10	15	...	...	...	...	...	2	1	2	1	3	1	...	2	8	1
92	Pneumonia	7	4	...	...	...	...	1	1	...	...	1	1	2	1	2	4	1
93	Pleurisy	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	..
103	Other diseases of stomach	1	...	...	...	...	...	...	...	...	1	...	...	...	...	...	1	1

August Infant Mortality.—*Concluded.*

Detailed List Class Number.	Causes of Death.	August Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
104	Diarrhea and enteritis	115	163	...	...	...	...	1	5	1	11	21	35	26	15	25	89	22
108	Appendicitis and typhlitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
109	Hernias, intestinal obstruction,	1	2	...	...	...	...	...	...	...	...	...	...	1	...	.....	1	...
117	Simple peritonitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
119	Acute nephritis	1	1	...	...	...	...	...	...	...	1	...	...	...	...	1	.....	...
143	Furuncle	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
144	Acute abscess	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
145	Other diseases of skin, etc.	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
150*a*	Hydrocephalus	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
b	Congenital malformations of heart.	3	4	...	...	...	...	...	1	...	1	1	...	...	...	.....	3	1
c	Other malformations	5	.....	1	...	...	...	...	1	...	3	...	...	...	...	.....	4	...
151*a*	Premature birth	36	.....	18	4	2	4	2	...	...	2	2	2	...	...	.....	6	4
b	Congenital debility	10	27	...	...	...	2	...	2	...	2	1	1	2	...	1	7	4
152*a*	Injuries at birth	10	.....	6	1	2	...	...	1	...	...	...	...	...	...	.....	1	1
b	Other causes peculiar to early infancy.	4	14	1	...	1	2	...	...	...	...	...	...	...	...	.....	.....	...
167	Burns (conflagrations excepted).	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
168	Absorption of deleterious gases,	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
172	Traumatism by fall	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
182, 184	Homicide	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
187, 189	Ill-defined diseases	1	2	...	...	...	...	...	...	...	...	...	1	...	...	1	.....	...
	Other causes	.....	4	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
	Breast fed *	40	40	...	...	...	...	...	4	...	7	5	6	12	6	40	.....	1
	Bottle fed *	135	181	...	...	...	...	...	11	2	18	23	41	25	14	....	135	33
	Nonresidents	37	48	1	...	...	1	1	5	1	5	5	13	3	1	1	33	37

* Aged two weeks and over.

Additional Deaths for Other Months.

July, 1912.— 1 female; broncho pneumonia; white; aged 2 years; single; residence Ward 6; born in Italy; mother born in Italy.

1 female; prematurity; white; aged 1 day minus; single; residence Ward 8; born in United States; mother born in Canada.

1 male; accidental drowning; white; aged 30 years; single; nonresident; birthplace unknown; birthplace of mother unknown.

DIVISION OF COMMUNICABLE DISEASES, AUGUST, 1912.

Medical Inspectors.

New cases visited:	
Diphtheria:	
a. Isolation	39
b. Diagnosis	5
Scarlet fever:	
a. Isolation	18
b. Diagnosis	9
c. Release	10
Typhoid fever	17
Measles	
a. Isolation	4
b. Diagnosis	3
Varicella:	
a. Isolation	4
b. Diagnosis	3
Epidemic cerebro-spinal meningitis	1
Ophthalmia neonatorum	9
Tuberculosis	29
Deaths investigated	19

Nurses.

New cases visited:	
Diphtheria	82
Scarlet fever	29
Cerebro-spinal meningitis	6
Anterior poliomyelitis	1
Malaria	2
Measles	116
Mumps	9
Ophthalmia neonatorum	77
Trachoma	3
Typhoid fever	56
Varicella	22
Whooping cough	73
Old cases visited	552
Release cultures taken for diphtheria	66

Disinfections.

Diphtheria	82
Scarlet fever	35
Tuberculosis	171
Infected bedding, etc.	1 lot
Infected books, etc.	21 lots
Infected clothing, etc.	2 lots
Infected carriages	1

Forcible Removals.

Tuberculosis	1

August, 1912. Cases Reported.

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum.
1	....	....	....	....	....	4	....	....	....	....	1	....	2
2	....	....	....	....	....	5	....	....	....	....	8	2	6
3	....	....	....	....	....	2	....	....	....	....	4	....	....
4	....	....	....	....	....	4	....	....	....	....	....	....	1
5	....	....	....	....	....	3	....	....	....	....	....	....	2
6	....	....	....	....	2	8	....	....	1	....	15	....	2
7	....	....	....	....	....	3	....	....	....	....	4	....	3
8	....	....	....	....	....	1	....	....	....	....	25	1	10
9	....	....	....	....	....	2	....	....	....	....	12	1	7
10	....	....	....	....	....	1	....	....	....	....	1	....	2
11	1	....	....	....	....	....	....	....	....	....	1	....	1
12	....	....	....	....	....	10	....	....	....	....	1	....	1
13	....	....	....	....	....	4	....	....	1	....	....	1	7
14	....	....	....	....	....	....	....	....	....	....	3	....	6
15	....	....	....	....	1	1	....	....	....	....	2	2	2
16	....	....	....	....	1	4	....	....	....	....	....	....	....
17	....	....	....	....	....	8	....	....	....	....	6	....	4
18	....	....	....	....	1	1	....	....	....	....	5	....	5
19	....	....	....	....	....	2	....	....	....	....	7	....	2
20	....	....	....	....	....	12	....	....	....	....	5	1	9
21	....	....	....	....	....	6	....	....	....	....	4	....	2
22	....	....	....	....	....	4	....	....	....	....	4	....	....
23	....	....	....	....	....	2	....	....	2	....	4	....	....
24	....	....	....	....	2	2	....	....	....	....	1	....	2
25	1	....	....	....	....	....	....	....	....	....	1	1	1
26	....	....	....	....	....	1	....	....	....	....	2	....	....
Total	2	....	....	....	7	90	....	....	4	....	116	9	77
Unknown	....	....	....	....	....	....	....	....	....	....	....	....	....
Nonresidents	1	....	....	....	1	5	....	....	3	....	2	....	7
Grand total	3	....	....	....	8	95	....	....	7	....	118	9	84
Corresponding month last year	9	1	....	....	7	100	....	....	10	....	95	2	93

COMMUNICABLE DISEASES.

Cases Reported. **August, 1912.**

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
1	....	....	....	....	8	....	3	....	2	11	....	 1
.....	....	....	2	....	16	1	4	....	.....	8	....	 2
.....	....	....	....	....	7	....	1	....	.....	3	....	 3
.....	....	....	....	....	4	....	1	....	.....	1	....	 4
.....	....	....	....	....	2	....	....	....	.....	.....	....	 5
.....	....	....	....	....	22	2	8	....	4	11	....	 6
.....	....	....	....	....	22	....	....	....	.....	11	....	 7
.....	....	....	....	....	20	....	3	....	3	1	....	 8
3	....	....	....	....	14	2	....	....	1	7	....	 9
.....	....	....	....	....	4	1	....	....	.....	.....	....	10
1	....	....	....	....	4	1	1	....	.....	1	....	11
3	....	....	....	....	12	....	4	....	.....	1	....	12
.....	....	....	....	....	7	....	1	....	1	1	....	13
1	....	....	....	....	8	1	....	....	4	4	....	14
.....	....	....	....	....	12	....	2	....	2	2	....	15
1	....	....	....	....	6	....	1	....	.....	2	....	16
3	....	....	....	....	15	1	3	....	.....	7	....	17
2	....	....	....	....	8	....	3	....	2	6	....	18
.....	....	....	....	....	8	3	2	....	.....	4	....	19
3	....	....	....	....	13	1	8	....	1	6	....	20
1	....	....	....	....	7	....	1	....	.....	6	....	21
5	....	....	....	....	5	1	1	....	1	.....	....	22
5	....	....	....	....	2	....	3	....	1	2	....	23
.....	....	....	....	....	10	....	4	....	.....	11	....	24
.....	....	....	....	....	5	....	2	....	.....	.....	....	25
.....	....	....	....	....	1	....	....	....	.....	.....	....	26
29	....	....	2	....	242	14	56	....	22	106	....	.....Total
.....	....	....	....	....	1	....	....	....	.....	.....	....	.....Unknown
.....	....	....	1	....	14	8	14	....	.....	1	....	.....Nonresidents
29	....	....	3	....	257	22	70	....	22	107	....	.....Grand total
63	....	1	....	....	254	....	55	....	19	63	....	Corresponding month last year.

Physical Examination of Licensed Minors.

There were 563 children between the ages of 14 and 16 years examined during the month. Two hundred and eighty-eight were found without defects and 275 were found with defects as follows:

Defective eyesight	42	Malnutrition	2
Hypertrophied tonsils	58	Ear	1
Defective teeth	190	Cervical glands	1
Cardiac disease	10	Skin disease	2
Defective palate	1	Defective breathing	1
Bronchitis	1		

Post-Natal Work.

Cases	3,155	Bottle-fed babies	698
Visits	4,624	Both feedings	266
Breast-fed babies	2,191		

Defective Conditions Noted.

Improper feeding	183	Pneumonia	1
Orthopedic defects	4	Vomiting and Diarrhea	21
Cervical glands	1	Skin disease	10
Otitis media	3	Whooping cough	2
Skin disease	5		

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:					
Positive for diagnosis			53		
Positive for release			34		
Negative for diagnosis			470		
Negative for release			99		
"No growth" cultures			18—		674
TUBERCULOSIS:					
Positive			90		
Negative			255		
Unsatisfactory			0—		345
TYPHOID:					
Positive			25		
Negative			172		
Atypical			11—		208
GLANDERS:	Strauss.	C.	F.	Ag.	
Positive	6	17	18	41	
Negative	7	17	11	35	
Atypical	0	3	2	5	
Unsatisfactory	2	0	0	2—	83
GONORRHEA:					
Positive			34		
Negative			99		
Unsatisfactory			0—		133
GONORRHEAL OPHTHALMIA:					
Positive			1		
Negative			54		
Unsatisfactory			0—		55
OTHER EXAMINATIONS:					
*Positive			15		
Negative			335		
Unsatisfactory			0—		350
BACTERIOLOGICAL MILK EXAMINATIONS			501		501
Bacteriological ice cream examinations			96		96
Total			2,445		2,445

SPECIAL WORK:

Longevity of tubercle bacilli in cow feces.

Examination of cow feces for tubercle bacilli.

Preparation for the complement fixation for syphilis and gonorrhea.

* Rats for plague, rabies, K-L Vir., T. B., smear, organisms, typhoid conradi, malaria, G-U. T. B., paratyphoid. Identification of rats autopsied in August, 1912, mus novegicus (227); mus alexandrinus (59); mus rattus (4); mus musculus (11).

INSPECTION OF MILK, VINEGAR, ETC.

Examination as to Statute Requirements.

Samples examined, milk from stores	305
" " milk from wagons	516
" " milk brought in by citizens	59
" " ice cream	33
" " milk for bacteriological examination	501
" " bacteriological ice cream	96
" " vinegar	130
" " butter and cheese	15
Total samples	1,655

REPORT OF DAIRY DIVISION FOR AUGUST.

INSPECTION OF DAIRIES.

Satisfactory * on first inspection	85	
Satisfactory on later inspection	4	
		89
Unsatisfactory on first inspection	40	
Unsatisfactory on later inspection	0	
		40
Total number of inspections		129
Dairies having milk rooms	41	
Dairies without milk rooms	88	
Number of cattle inspected	3,247	
Number of dairies prohibited shipping milk to Boston because of insanitary conditions of premises	3	

Receipts.	Quarts.	*Shipments.*	Quarts.	*Pasteurized.*	Quarts.
Milk	4,301,323	Milk in bottles,	2,296,687	Milk	3,056,111
Cream	297,175	Milk in cans	1,680,813	Cream	213,503
Skimmed milk	191,268	Cream in bottles,	113,686		
Certified milk	17,818	Cream in cans	136,264		
Inspected milk,	8,233	Skimmed milk	154,505		
		Certified milk	17,587		
		Inspected milk	8,218		
		Modified milk	183		

Average temperature of milk, in the car, 45 degrees Fahrenheit.

* "Satisfactory" means having a score of at least 45 per cent by the government score card.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	612	Cattle condemned (6 and parts),	3,879 lbs.
Calves inspected	396	Calves condemned (1)	33 lbs
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	4,079	Swine condemned (4 and parts),	2,597 lbs.

INSPECTION OF PROVISIONS.—ARTICLES CONDEMNED.

Meats.

Veal (tainted)	280 lbs.	Poultry (tainted)	282 lbs.
Mutton (tainted)	351 lbs.	Beef tuberculosis	700 lbs.
Beef (tainted)	4 lbs.		

SANITARY INSPECTION DIVISION.

New reports	4,535
Reinspections	3,844
New theatre and public hall reports	214
New tenement house reports	139
Nuisances reported	3,409
Legal notices	298
Court cases	13
Fines	$69
Tenements vacated	2
Stable permits granted	1
Stable permits refused	1
Stable hearings	4
Dump permits granted	3
Dump permits revoked	1
Milk applications approved	121

QUARANTINE.

Vessels inspected at quarantine	67
Total immigrants arriving in Boston	5,029

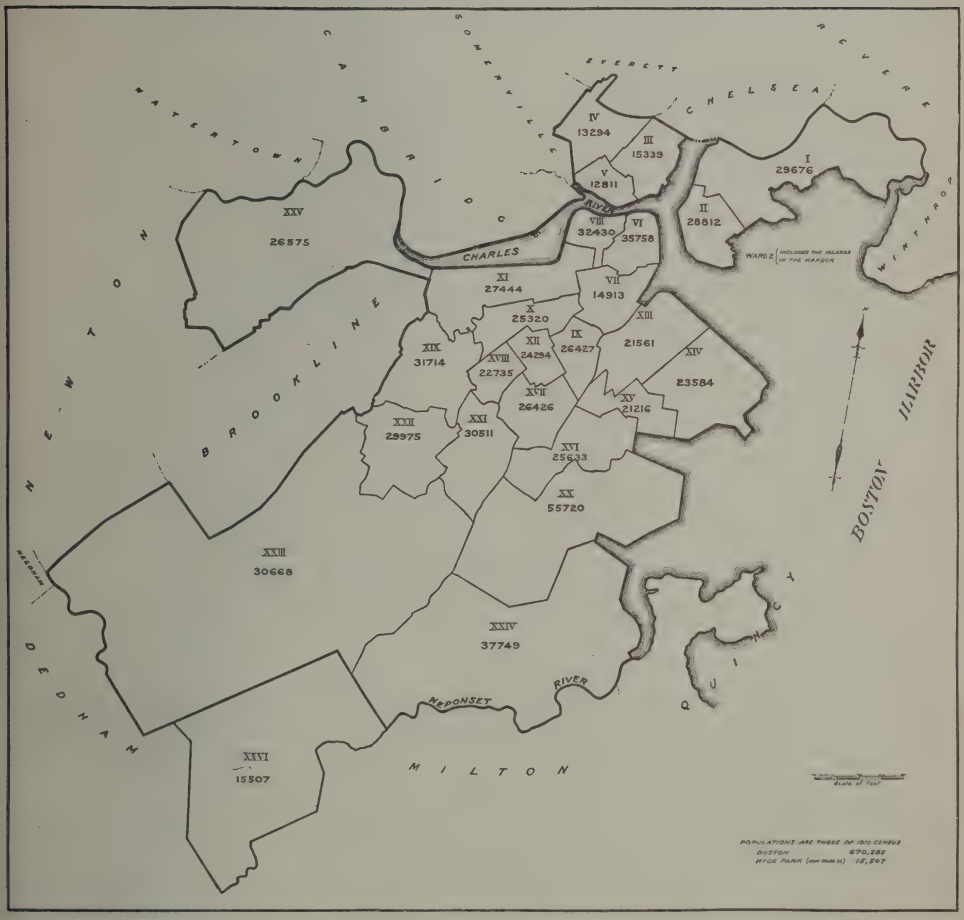
MONTHLY METEOROLOGICAL SUMMARY.

Taken at Weather Bureau, Boston, August, 1912.

Day.	Temperature, Degrees Fahrenheit.			Relative Humidity.	Daily Precipitation.	Actual Hours Sunshine.	Wind.		
	Maximum.	Minimum.	Mean.				Average Hourly Velocity. (Miles.)	Maximum Velocity. (Miles.)	Prevailing Direction.
1.....	71	60	66	86	.08	3.8	5.6	10	E.
2.....	76	61	68	70	T	9.9	6.1	12	N. W.
3.....	73	60	66	69	.12	9.8	12.0	23	W.
4.....	76	57	66	61	0	10.6	7.5	13	W.
5.....	76	57	66	58	0	11.2	7.0	13	W.
6.....	75	58	66	65	0	13.2	6.2	12	N. W.
7.....	72	60	66	72	T	10.1	5.8	13	E., S. E.
8.....	81	66	74	68	0	9.5	8.6	19	S. W.
9.....	80	63	72	72	0	8.7	10.0	19	S.
10.....	82	66	74	81	0	8.9	12.0	22	S.
11.....	80	72	76	92	.66	5.8	13.6	23	S.
12	87	71	79	73	0	11.6	9.8	17	S. W.
13.....	88	72	80	69	0	12.3	8.4	15	W.
14.....	87	72	80	74	.02	9.8	8.9	20	S. W.
15.....	87	65	76	73	.21	11.0	8.8	15	N. W.
16.....	69	58	64	75	0	13.8	8.9	18	N. W.
17.....	75	54	64	62	0	11.0	6.7	12	N. W.
18.....	63	58	60	86	.45	0	8.3	22	S.
19.....	70	56	63	88	0	8.8	6.7	13	E.
20.....	68	63	66	88	.34	6.1	5.2	11	S. W.
21.....	73	62	68	80	0	6.8	5.5	12	E.
22.....	84	65	74	74	0	11.8	9.4	15	W.
23.....	84	65	74	78	.06	8.2	11.0	34	S. W.
24.....	76	62	69	62	0	13.5	12.6	22	W.
25.....	90	66	78	65	0	13.5	12.2	22	S. W.
26.....	76	60	68	89	0	4.8	10.1	18	E.
27.....	82	58	70	64	0	13.4	12.1	22	N. W.
28.....	74	53	64	58	0	11.0	10.3	20	W.
29.....	74	55	64	56	T	9.3	10.4	17	N. W.
30.....	67	49	58	56	0	13.2	14.8	27	N. W.
31.....	64	49	56	66	0	9.3	7.4	12	N. W.
Totals.....	—	—	—	—	1.94	300.7	—	—	—
Means.....	76.8	61.1	68.9	72.0	.....	9.7	9.1	.....	N. W.

Latitude 42 degrees 21 minutes. Longitude 71 degrees 4 minutes.

BOSTON WARD MAP.



Vol. 1 SEPTEMBER, 1912 No. 9

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF THE

CITY OF BOSTON

	Page
Vital Statistics, September, 1912	227
Monthly reports	238

CITY OF BOSTON
PRINTING DEPARTMENT
1912

ORGANIZATION OF THE HEALTH DEPARTMENT

FRANCIS X. MAHONEY, M. D., *Chairman.*
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

TRADES UNION LABEL COUNCIL BOSTON MASS

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, SEPTEMBER, 1912. No. 9.

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF SEPTEMBER, 1912.

Boston had 885 deaths in September, compared with 880 for September of last year; and a death rate of 14.95 against 15.54 for September, 1911.

Of deaths from reportable diseases the principal decreases were measles, 5, diphtheria, 2, and typhoid fever, 2; and the principal increases were tuberculosis (all forms), 13, and whooping cough, 3.

Other important differences were as follows:

September, 1912, decreases compared with September, 1911:

Organic heart disease, Bright's disease and nephritis	11
Apoplexy	10
Cancer	6

September, 1912, increases compared with September, 1911:

"Other diseases"	14
Violent deaths	7
Appendicitis	6
Puerperal diseases	5

Ward 11 had the lowest rate, 3.69, and Ward 7 the highest, 24.97. Deaths of nonresidents were 135 against 108 in September, 1911.

One hundred cases of diphtheria were reported against 101 in September, 1911; only 31 cases of scarlet fever against 76 last year, and 68 cases of typhoid fever against 92 last year. On the other hand there were 238 cases of tuberculosis against 209 last year, and 87 cases of whooping cough against 51 last year.

There were 10 more deaths under 1 year than in September, 1911, but 28 less than the average for the preceding five years.

Of the 235 deaths under 1 year, 77 were due to premature birth, congenital debility, malformations and other diseases peculiar to early infancy; 99 to diarrhea and enteritis; 17 to pneumonia; 9 to reportable diseases; and 33 to other causes. Of these deaths under 1 year, Ward 1 furnished the largest number, 15, and Ward 6 came next with 13. One hundred and eighty-three were over 2 weeks old, and of these 134 were bottle-fed.

VITAL STATISTICS.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
*Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	137.06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	‡298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston January 1, 1912, and became Ward 26. Under "Boston," in the above table, Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau.

‡ An infant asylum is located in this ward.

September. General Summary.

	1912.	1911.
Total deaths	885	880
Population, estimated*	720,031	688,912
Death rate per 1,000	14.95	15.54
Deaths of nonresidents	135	108
Corrected death rate†	12.67	13.63

*Population estimated by arithmetical method used by Census Bureau.
†Nonresidents not included.

September, 1912. Statement of Deaths.

Total number (stillbirths excluded)	885
Sex.	
Males	475
Females	410
Condition.	
Single	459
Married	276
Widowed	142
Divorced	3
Unknown	5
Color.	
White	856
Black (negro or mixed)	27
Chinese	2
Deaths of children:	
Under one year	235
Under two years	263
Under five years	286
Stillbirths during the month,	60

Nativity.	
United States	584
Ireland	126
England and Wales	21
Scotland	9
Germany	9
Canada	65
Italy	19
Russia and Poland	19
Sweden and Norway	10
France	2
Other countries	13
Unknown	8
Nativity of Mothers.	
United States	269
Ireland	277
England and Wales	21
Scotland	9
Germany	18
Canada	85
Italy	57
Russia and Poland	52
Sweden and Norway	14
France	1
Other countries	20
Unknown	62

Abridged List Class Number.	Causes of Death.	Totals. September, 1912.	Totals. September, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes {1912 / 1911}	885 /	..... / 880	235 / 225	28 / 34	8 / 7	12 / 4	3 / 7	286 / 277	16 / 24	8 / 7	15 / 14
1	Typhoid fever	9	11	.....	.....	.....	.....	.....	.....	1	.....	.....
3	Malarial fever	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	3	8	.....	3	.....	.....	.....	3	.....	.....	.....
6	Scarlet fever	1	2	.....	.....	1	.....	.....	1	.....	.....	.....
7	Whooping cough	7	4	5	.....	1	1	.....	7	.....	.....	.....
8	Diphtheria and croup	4	6	.....	.....	.....	1	.....	1	2	.....	.....
9	Influenza	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	5	9	2	1	.....	.....	.....	3	.....	.....	.....
13	Tuberculosis of the lungs	88	73	1	.....	.....	.....	.....	1	2	1	6
14	Tuberculous meningitis	2	10	.....	1	.....	.....	1	2	.....	.....	.....
15	Other forms of tuberculosis	9	3	2	1	1	.....	.....	4	.....	.....	1
16	Cancer, malignant tumor	57	63	.....	.....	.....	.....	.....	.....	.....	1	.....
17	Simple meningitis (except cerebro-spinal meningitis).	5	3	1	1	.....	2	.....	4	.....	.....	.....
17a	Cerebro-spinal meningitis	2	.....	1	.....	.....	.....	.....	1	.....	.....	.....
18	Apoplexy and softening of the brain	31	41	1	.....	.....	.....	.....	1	.....	.....	.....
19	Organic heart diseases	98	78	1	.....	1	.....	1	3	1	2	5
20	Acute bronchitis	5	7	3	.....	.....	.....	.....	3	.....	.....	.....
21	Chronic bronchitis	1	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	46	43	8	4	1	2	.....	15	1	.....	.....
22a	Broncho-pneumonia	18	25	9	2	.....	.....	.....	11	1	.....	.....
23	Other respiratory diseases	4	6	.....	.....	.....	1	.....	1	.....	1	.....
24	Diseases of the stomach (cancer excepted).	12	1	8	.....	.....	.....	.....	8	.....	.....	.....
25	Diarrhea and enteritis (under two years).	113	115	99	14	.....	.....	.....	113	.....	.....	.....
26	Appendicitis and typhlitis	12	6	.....	.....	.....	.....	.....	.....	1	2	.....
27	Hernia, intestinal obstruction	6	4	1	.....	.....	.....	.....	1	.....	.....	.....
28	Cirrhosis of liver	9	8	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	37	68	68	.....	.....	.....	.....	.....	.....	.....	.....
30	Diseases of women (not cancer)	3	5	5	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	2	3	3	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	8	2	2	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	60	56	60	.....	.....	.....	.....	60	.....	.....	.....
34	Old age	2	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	60	53	3	.....	1	3	.....	7	4	.....	.....
36	Suicide	7	11	.....	.....	.....	.....	.....	.....	.....	.....	.....
37	Other diseases	157	143	30	1	2	2	1	36	3	1	3
38	Ill-defined causes	1	6	.....	.....	.....	.....	.....	.....	.....	.....	.....

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex.		Abridged List Class Number.
															Males.	Females.	
37	28	49	60	44	42	57	37	54	40	41	36	24	11	.....	475	410	
33	34	44	52	41	51	43	50	57	59	40	26	18	8	2	465	415	
3	1	2	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	7	2	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	1	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	1	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	6
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	5	7
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	9
.....	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	4	1	12
9	7	18	11	7	8	4	2	8	3	1	.....	.....	.....	.....	56	32	13
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	14
.....	1	1	1	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	6	3	15
.....	1	3	4	5	2	8	6	6	7	4	4	5	1	.....	20	37	16
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	3	17
1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	17a
.....	.....	.....	1	3	1	4	3	5	2	3	3	2	3	.....	13	18	18
3	2	1	5	4	6	8	6	10	11	14	8	7	2	.....	53	45	19
.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	1	.....	.....	3	2	20
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	1	.....	21
1	3	1	4	2	4	1	3	1	1	5	.....	4	.....	.....	20	26	22
.....	.....	.....	1	.....	.....	3	.....	.....	1	1	.....	.....	.....	.....	10	8	22a
.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	2	2	23
1	.....	1	.....	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	8	4	24
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	52	61	25
1	3	1	.....	1	.....	1	.....	1	1	.....	.....	.....	.....	.....	8	4	26
1	.....	.....	2	.....	.....	1	.....	.....	1	.....	.....	.....	.....	.....	2	4	27
1	.....	.....	.....	1	2	4	.....	1	.....	.....	.....	.....	.....	.....	4	5	28
.....	.....	.....	1	4	3	6	3	7	4	3	3	1	2	.....	23	14	29
.....	.....	.....	1	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	30
1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	31
3	1	2	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	8	32
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	31	29	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....	.....	1	1	34
7	2	9	10	4	2	2	5	6	.....	1	1	.....	.....	.....	48	12	35
2	.....	1	.....	1	.....	1	.....	1	.....	.....	1	.....	.....	.....	6	1	36
3	6	8	14	10	11	12	7	8	7	8	14	3	3	.....	87	70	37
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence.										
			1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	885	47	35	20	19	17	31	30	28	24	28	9
	Rates per 1,000 population ... Sept., 1912	14.95	18.11	14.15	15.63	16.94	16.06	9.84	24.97	10.28	10.30	13.11	3.69
	Sept., 1911	15.54	16.63	14.43	14.16	18.94	14.20	19.64	12.37	15.57	14.61	6.63	10.18
1	Typhoid fever	9	2	2	1	.....	.....	.....	.....	.....	.....	.....	.....
3	Malarial fever	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	3	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....
6	Scarlet fever	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough	7	1	.....	.....	.....	.....	.....	.....	.....	.....	1	.....
8	Diphtheria and croup	4	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
9	Influenza	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
11	Cholera nostras	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	5	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....
13	Tuberculosis of the lungs	88	4	2	1	1	2	2	11	4	2	1	3
14	Tuberculous meningitis	2	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
15	Other forms of tuberculosis	9	1	.....	.....	.....	1	1	.....	.....	.....	.....	.....
16	Cancer, malignant tumor	57	4	4	3	1	1	1	1	2	1	.....	.....
17	Simple meningitis (except cerebro-spinal meningitis).	5	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....
17a	Cerebro-spinal meningitis	2	.....	1	.....	.....	.....	1	.....	.....	.....	.....	.....
18	Apoplexy and softening of the brain.	31	1	2	1	1	2	1	.....	2	.....	1	.....
19	Organic heart diseases	98	8	2	4	1	.....	.....	1	1	3	6	1
20	Acute bronchitis	5	.....	.....	.....	.....	.....	2	.....	.....	1	.....	.....
21	Chronic bronchitis	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	46	3	1	.....	2	1	2	2	2	.....	1	.....
22a	Broncho-pneumonia	18	1	3	.....	.....	.....	3	.....	1	.....	.....	1
23	Other respiratory diseases	4	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	12	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
25	Diarrhea and enteritis (under two years).	113	9	2	4	3	2	12	4	1	2	1	1
26	Appendicitis and typhlitis	12	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
27	Hernia, intestinal obstruction,	6	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....
28.	Cirrhosis of liver	9	.....	2	.....	1	.....	.....	.....	1	.....	.....	1
29	Bright's disease and nephritis	37	.....	.....	1	.....	2	1	1	3	1	1	.....
30	Diseases of women (not cancer),	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	2	.....	.....	.....	2	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	8	1	.....	.....	.....	.....	.....	.....	1	1	.....	.....
33	Congenital debility and malformations.	60	1	2	.....	1	1	.....	2	2	3	2	.....
34	Old age	2	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	60	2	2	1	2	2	.....	.....	3	1	6	2
36	Suicide	7	1	.....	.....	.....	.....	.....	.....	1	.....	1	.....
37	Other diseases	157	6	7	4	4	3	3	4	4	8	7	.....
38	Ill defined causes	1	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
	Total deaths under one year	235	15	8	5	5	2	13	7	6	7	6	2

Cause and Residence. September, 1912.

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number.
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
28	43	30	22	30	41	28	35	43	28	25	26	34	22	14	....	135	13	....
13.40	24.31	15.06	12.38	13.38	18.23	14.81	12.97	8.45	10.55	9.83	9.71	10.22	9.33	10.68	....	....	...	.....
15.63	16.95	18.30	8.51	11.46	14.45	14.89	13.17	16.67	12.75	7.18	8.83	9.30	11.84	.....	....	....	...	.....
.....	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	2	...	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	4
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	5
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	6
.....	.....	1	1	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	1	...	7
.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	....	1	...	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	9
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	11
.....	.....	.....	.....	.....	1	.....	2	.....	.....	.....	.....	.....	.....	.....	....	1	...	12
.....	6	3	3	6	7	4	2	.....	.....	2	4	6	2	2	....	7	1	13
.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	14
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	5	...	15
4	.....	3	1	2	4	.....	1	7	2	.....	2	4	2	.....	....	7	...	16
.....	1	.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....	....	....	...	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	17a
.....	1	2	1	1	1	1	2	3	2	2	.....	.....	.....	1	....	3	...	18
3	4	3	4	4	5	2	4	6	3	6	4	6	6	1	....	9	1	19
.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	1	.....	.....	.....	....	....	...	20
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	....	....	...	21
2	4	2	2	2	.....	.....	3	4	.....	1	1	2	2	1	....	6	...	22
2	.....	1	.....	.....	1	1	1	.....	1	.....	.....	1	.....	.....	....	1	...	22a
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	2	...	23
.....	1	.....	.....	.....	.....	.....	1	1	2	.....	.....	1	.....	.....	....	4	...	24
2	9	4	2	1	3	4	3	3	3	4	2	2	5	2	....	16	7	25
.....	1	.....	.....	.....	.....	1	.....	1	.....	.....	1	.....	.....	1	....	7	...	26
.....	.....	.....	1	1	.....	1	.....	.....	1	.....	.....	.....	.....	.....	....	1	...	27
.....	.....	.....	.....	1	1	.....	.....	.....	1	.....	1	.....	.....	.....	....	....	...	28
4	4	2	.....	.....	1	2	3	2	2	3	1	1	1	.....	....	1	...	29
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	....	2	...	30
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	31
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	1	1	.....	.....	.....	....	2	...	32
3	1	2	2	4	2	2	1	3	3	1	3	3	.....	2	....	12	2	33
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	....	....	...	34
2	6	.....	.....	1	3	2	3	2	1	1	1	1	1	.....	....	14	1	35
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	....	2	1	36
6	3	4	3	6	11	7	7	8	6	3	4	7	2	3	....	27	...	37
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	38
6	11	7	5	8	8	8	8	10	11	5	7	8	4	4	....	40	9	

VITAL STATISTICS.

September Infant Mortality.

Detailed List Class Number.	Causes of Death.	September Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	235	225	20	6	8	10	8	11	10	32	20	48	41	21	49	134	40
	Male	124	113	7	3	4	6	3	7	8	22	5	23	23	13	23	78	19
	Female	111	112	13	3	4	4	5	4	2	10	15	25	18	8	26	56	21
	White	230	220	20	6	7	10	7	11	10	32	28	47	41	21	49	131	38
	Colored	5	5	...	...	1	...	1	...	...	...	2	1	...	...	.....	3	2
1	Typhoid fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
5	Smallpox	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
6	Measles	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
7	Scarlet fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
8	Whooping cough	5	3	...	...	...	...	...	...	...	1	...	2	2	...	4	1	1
9	Diphtheria and croup	.....	2	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
10	Influenza	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
14	Dysentery	1	2	...	...	...	...	...	...	...	...	...	...	...	1	.....	1	...
18	Erysipelas	1	1	...	...	...	...	...	...	...	1	...	...	...	...	1	.....	...
19	Other epidemic diseases	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
20	Pus-infection and septicemia,	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
24	Tetanus	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
28	Tuberculosis of the lungs	1	.....	...	...	...	...	...	...	...	...	...	...	1	...	1	.....	1
29	Acute miliary tuberculosis	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
30	Tuberculous meningitis	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
31 35	Other forms of tuberculosis	2	2	...	...	...	...	...	...	...	...	1	...	1	...	.....	2	1
36	Rickets	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
37	Syphilis	6	2	1	...	...	...	1	...	1	...	...	1	2	...	.....	4	1
38	Gonococcus infection	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
61	Simple meningitis	1	1	...	...	...	...	...	...	...	...	1	...	...	...	.....	1	...
61a	Cerebro-spinal fever	1	.....	...	...	...	...	...	...	...	...	...	...	1	...	1	.....	...
63a	Acute poliomyelitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
71	Convulsions	2	.....	...	...	...	...	1	...	...	1	...	...	...	...	.....	1	...
76	Diseases of the ears	1	.....	...	...	...	...	...	...	...	...	...	...	...	1	.....	1	1
79	Organic diseases of the heart,	1	.....	...	...	...	...	...	1	...	...	...	...	...	...	1	.....	...
89	Acute bronchitis	3	4	...	...	...	...	...	...	2	...	...	1	...	...	2	1	...
91	Broncho-pneumonia	9	10	...	...	...	...	...	...	...	1	...	1	5	2	3	6	1
92	Pneumonia	8	11	...	1	...	1	1	...	...	...	...	1	3	1	2	3	...
93	Pleurisy	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
103	Other diseases of stomach	8	.....	...	...	...	...	...	...	1	2	2	2	1	...	1	7	3

September Infant Mortality.—*Concluded.*

Detailed List Class Number.	Causes of Death.	September Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
104	Diarrhea and enteritis	99	107	...	...	...	...	...	3	3	17	10	32	22	12	25	74	16
108	Appendicitis and typhlitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	...	.....	...
109	Hernias, intestinal obstruction,	1	.....	...	...	...	...	...	...	...	1	...	...	...	...	....	1	1
117	Simple peritonitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
119	Acute nephritis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
143	Furuncle	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
144	Acute abscess	1	.....	...	...	...	...	...	...	...	...	...	1	...	...	....	1	1
145	Other diseases of skin, etc.	1	.....	...	...	...	...	...	...	1	...	...	...	...	...	1	.....	...
150*a*	Hydrocephalus	1	.....	...	...	...	...	...	...	...	...	1	...	...	...	1	.....	...
b	Congenital malformations of heart.	9	11	...	1	...	2	1	3	...	...	...	...	1	1	1	4	2
c	Other malformations	5	.....	...	...	...	1	2	...	1	...	1	...	...	...	....	2	...
151*a*	Premature birth	23	.....	10	2	3	2	1	2	...	1	1	1	...	...	....	5	6
b	Congenital debility	22	43	2	...	1	1	...	...	...	6	2	6	1	3	3	15	4
152*a*	Injuries at birth	10	.....	6	1	2	...	...	1	...	...	...	...	...	...	....	1	...
b	Other causes peculiar to early infancy.	7	16	1	1	2	2	1	...	...	...	...	...	...	...	....	.....	1
167	Burns (conflagrations excepted).	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
168	Absorption of deleterious gases,	3	.....	...	...	...	...	...	1	1	1	...	...	...	...	2	1	...
172	Traumatism by fall	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
182, 184	Homicide	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
187, 189	Ill-defined diseases	.....	3	...	...	...	...	...	...	...	...	...	...	...	...	....	.....	...
	Other causes	3	4	...	...	...	1	...	...	...	...	1	...	1	...	.....	2	...
	Breast fed *	49	40	...	...	...	...	...	4	3	6	4	16	10	6	49	.....	6
	Bottle fed *	134	137	...	...	...	...	...	7	7	26	16	32	31	15	....	134	26
	Nonresidents	40	14	2	...	3	2	1	1	1	5	5	11	7	2	6	26	...

* Aged two weeks and over.

Additional Deaths for Other Months.

August, 1912.— 1 male, traumatism by machines; white; aged 72 years; widowed; residence Ward 1; born in Ireland; birthplace of mother unknown.

DIVISION OF COMMUNICABLE DISEASES, SEPTEMBER, 1912.

Medical Inspectors.

New cases visited:	
Diphtheria:	
a. Isolation	48
b. Diagnosis	7
Scarlet fever:	
a. Isolation	13
b. Diagnosis	11
c. Release	5
Measles:	
a. Isolation	6
b. Diagnosis	4
Varicella:	
a. Isolation	9
b. Diagnosis	3
Ophthalmia neonatorum	5
Tuberculosis	48
Variola	1
Deaths investigated	19
Vaccinations performed	616
Certificates of vaccination issued	249

Nurses.

New cases visited:	
Diphtheria	96
Scarlet fever	28
Measles	64
Varicella	26
Typhoid fever	68
Whooping cough	82
Ophthalmia neonatorum	75
Mumps	8
Cerebro-spinal meningitis	7
Release cultures taken for diphtheria	70
Old cases visited:	
Diphtheria	110
Scarlet fever	98

Measles	70
Varicella	36
Typhoid fever	106
Whooping cough	77
Ophthalmia neonatorum	137
Mumps	15
Cerebro-spinal meningitis	11

Disinfections.

Diphtheria	96
Scarlet fever	23
Tuberculosis	172
Infected bedding	2 lots
Infected books, etc.	1 lot
Infected clothing, etc.	3 lots
Infected carriages	1

Forcible Removals.

Tuberculosis	4
Diphtheria	3

September, 1912. Cases Reported.

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum.
1	....	....	....	....	1	9	....	....	....	....	.....	1	3
2	....	....	....	....	1	6	....	....	....	....	2	3	8
3	....	....	....	....	1	2	....	....	....	....	3	....	8
4	....	....	....	....	....	2	....	....	....	....	1	....	2
5	....	....	....	....	....	2	....	....	....	....	.....	.....	....
6	....	....	....	....	....	4	....	....	....	....	9	3	5
7	....	....	....	....	....	2	....	....	....	....	1	....	2
8	....	....	....	....	1	11	....	....	....	....	8	....	10
9	1	....	....	....	....	.....	....	....	....	....	9	....	7
10	....	....	....	....	....	.....	....	....	....	....	8	....	....
11	....	....	....	....	....	3	....	....	1	....	1	....	....
12	....	....	....	....	....	9	....	....	....	....	2	....	....
13	....	....	....	....	1	5	....	....	....	....	.....	....	3
14	1	....	....	....	....	4	....	....	....	....	6	....	5
15	....	....	....	....	....	3	....	....	....	....	.....	....	2
16	1	....	....	....	....	2	....	....	1	....	.....	....	1
17	....	....	....	....	....	4	....	....	1	....	3	....	6
18	....	....	....	....	....	5	....	....	....	....	1	....	1
19	....	....	....	....	....	3	....	....	....	....	2	....	2
20	....	....	....	....	....	4	....	....	....	....	3	....	5
21	....	....	....	....	....	3	....	....	....	....	2	....	....
22	....	....	....	....	1	1	....	....	....	....	2	....	2
23	....	....	....	....	....	4	....	....	1	....	4	1	....
24	....	....	....	....	....	5	....	....	....	....	.....	....	1
25	....	....	....	....	1	2	....	....	....	....	2	....	1
26	....	....	....	....	....	1	....	....	....	....	1	....	1
Total	3	....	....	....	7	96	....	....	4	....	70	8	75
Unknown	....	....	....	....	....	.....	....	....	....	....	.....	....	....
Nonresidents	....	....	....	....	....	4	....	....	2	....	.....	....	3
Grand total	3	....	....	....	7	100	....	....	6	....	70	8	78
Corresponding month last year	8	....	....	....	1	101	....	....	5	....	82	4	89

COMMUNICABLE DISEASES.

Cases Reported. **September, 1912.**

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
5	....	....	....	....	7	1	3	....	1	7	....	1
4	....	....	....	....	10	....	6	....	1	3	....	2
.....	....	....	....	....	3	....	3	....	1	1	....	3
.....	....	....	....	....	6	....	....	....	.....	6	....	4
.....	....	....	....	....	3	1	3	....	.....	.....	....	5
.....	....	....	....	....	10	3	8	....	1	8	....	6
.....	....	....	....	....	25	1	1	....	.....	1	....	7
2	....	....	....	....	12	2	1	....	10	2	....	8
2	....	....	....	....	16	1	....	....	.....	2	....	9
1	....	....	....	....	10	....	....	....	.....	4	....	10
.....	1	....	....	....	4	....	1	....	.....	.....	....	11
1	....	....	....	....	16	....	3	....	.....	4	....	12
3	....	....	....	....	8	1	4	....	2	.....	....	13
.....	....	....	....	....	9	1	4	....	.....	6	....	14
.....	....	....	....	....	8	2	3	....	.....	5	....	15
1	....	....	....	....	6	....	4	....	.....	1	....	16
1	....	1	....	....	11	1	....	....	.....	20	....	17
2	....	....	....	....	11	....	....	....	1	2	....	18
1	....	....	....	....	10	....	....	....	1	3	....	19
.....	....	....	....	....	13	....	3	....	5	3	....	20
.....	....	....	....	....	10	....	3	....	3	2	....	21
1	....	....	....	....	6	....	2	....	.....	1	....	22
1	....	....	....	....	6	....	7	....	1	.....	....	23
.....	....	....	....	....	6	....	1	....	2	.....	....	24
2	....	....	....	....	1	1	4	....	2	5	....	25
.....	....	....	....	....	4	....	....	....	.....	.....	....	26
27	1	1	....	....	231	15	64	....	31	86	....	Total
.....	....	....	....	....	.....	....	1	....	.....	.....	....	Unknown
4	....	....	1	....	7	1	3	....	.....	1	....	Nonresidents
31	1	1	1	....	238	16	68	....	31	87	....	Grand total
76	....	1	3	....	209	....	92	....	15	51	....	Corresponding month last year.

DIVISION OF CHILD HYGIENE.—SEPTEMBER, 1912.

1. Medical Inspection of Schools.

Number inspections made	123,350
Number physical examinations made	5,338
Number visits made to home	106

There were 3,928 pupils excluded from school during the month, ill with contagious diseases, as follows:

Diphtheria	4	Exposed to measles	2
Scarlet fever	5	Exposed to diphtheria	2
Measles	2	Pediculosis	3,080
Chicken pox	6	Trachoma	3
Whooping cough	13	Acute or purulent conjunctivitis	15
Mumps	3	Ringworm	32
Pulmonary tuberculosis	2	Scabies	74
Acute tonsilitis	48	Impetigo	100
Unvaccinated	182	Favus	5
Nasal discharge, cultures taken	30	Molluscum, contagiosum	1
Tonsilitis (?)	3	Miscellaneous	316

There were 11,521 cases of noncontagious diseases found, subdivided as follows:

Diseases of oral and respiratory tract	2,529
Diseases of ear	75
Diseases of eye	399
Diseases of skin	815
Dental caries	2,704
Miscellaneous	5,001

2. Physical Examination of Licensed Minors.

There were 849 children between the ages of 14 and 16 years examined during the month. Two hundred and sixty-six were found to be without defects and 583 with defects as follows:

Defective eyesight	50	Unvaccinated	12
Hypertrophied tonsils	145	Bronchitis	11
Defective teeth	420	Orthopedic defects	19
Cardiac disease	14	Defective hearing	19
Defective palate	3	Defective nasal breathing,	40
Skin disease	35	Defective speech	1
Malnutrition	7	Mental deficiency	1
Cervical glands	7	Miscellaneous	27

Certificates were not granted at this time to five persons.

3. Post-Natal Work.

Cases	2,850	Bottle-fed babies	393
Visits	4,348	Both feedings	243
Breast-fed babies	2,214		

Defective Conditions Noted.

Improper feeding	102	Whooping cough	1
Skin	13	Pneumonia	3
Otitis media	3	Gastro-enteritis	10
Ophthalmia	12	Miscellaneous	14

Pre-Natal Work.

Number cases	5	Number visits	11

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:		
Positive for diagnosis	64	
Positive for release	37	
Negative for diagnosis	774	
Negative for release	106	
"No growth" cultures	12—	993
TUBERCULOSIS:		
Positive	100	
Negative	334	
Unsatisfactory	0—	434
TYPHOID:		
Positive	38	
Negative	267	
Atypical	15—	320

GLANDERS:	Strauss.	C. F.	Ag.	
Positive	1	32	30	63
Atypical	0	3	8	11
Negative	0	16	21	37
Unsatisfactory	1	0	0	1—112

GONORRHEA:		
Positive	37	
Negative	119	
Unsatisfactory	0—	156
GONORRHEAL OPHTHALMIA:		
Positive	1	
Negative	42	
Unsatisfactory	0—	43
OTHER EXAMINATIONS:		
*Positive	9	
Negative	261	
Unsatisfactory	1—	271
BACTERIOLOGICAL MILK EXAMINATIONS	644	644
Bacteriological ice cream examinations	47	47
Bacteriological buttermilk examinations	3	3
Total	3,023	3,023

SPECIAL WORK:
Longevity of tubercle bacilli in cow feces.

* K-L Vir. swab for T. B., organisms, typhoid conradi, malaria, G-U. T. B., paratyphoid, typhoid feces and urine, hookworm. Rats for plague: Identification of rats autopsied in September, 1912, mus novegicus (153); mus rattus (22); mus alexandrinus (9).

INSPECTION OF MILK, VINEGAR, ETC.

Examination as to Statute Requirements.

Samples examined, milk from stores	455
" " milk from wagons	695
" " milk brought in by citizens	63
" " ice cream	23
" " milk for bacteriological examination	644
" " bacteriological ice cream	47
" " vinegar	84
" " butter and cheese	1
" " eggs	9
Total samples	2,021

REPORT OF DAIRY DIVISION FOR SEPTEMBER.

INSPECTION OF DAIRIES.

Satisfactory * on first inspection	109	
Satisfactory on later inspection	87	
	—	196
Unsatisfactory on first inspection	78	
Unsatisfactory on later inspection	24	
	—	102
Total number of inspections		298
Dairies having milk rooms	112	
Dairies without milk rooms	186	
Number of cattle inspected	3,296	
Number of dairies prohibited shipping milk to Boston because of insanitary conditions of premises	21	

Receipts.	Quarts.	*Shipments.*	Quarts.	*Pasteurized.*	Quarts.
Milk	6,271,344	Milk in bottles	3,126,738	Milk	5,545,452
Cream	1,350,797	Milk in cans	2,981,686	Cream	1,279,431
Skimmed milk	222,685	Cream in bottles,	87,334	Skimmed milk	104,633
Certified milk	28,996	Cream in cans	501,142	Certified milk	none.
Inspected milk,	7,667	Skimmed milk	192,777		
Modified milk	370	Certified milk	28,102		
		Inspected milk	7,093		
		Modified milk	242		

Average temperature of milk in car, 44 degrees Fahrenheit.

* "Satisfactory" means having a score of at least 45 per cent by the government score card.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	265	Cattle condemned (2 and parts),	1,413 lbs.
Calves inspected	492	Calves condemned (3)	101 lbs.
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	5,129	Swine condemned (8 and parts),	3,396 lbs.

INSPECTION OF PROVISIONS.—ARTICLES CONDEMNED.

Meats.		Miscellaneous.	
Veal (tainted)	68 lbs.	Fish (tainted)	30 lbs.
Mutton (tainted)	122 lbs.	Apples (decayed)	6 bush.
Beef (tainted)	700 lbs.		
Pork (tainted)	150 lbs.		
Poultry (tainted)	141 lbs.		
Veal (unstamped)	90 lbs.		

SANITARY INSPECTION DIVISION.

New reports	3,585
Reinspections	5,156
New tenement house reports	272
Nuisances reported	3,751
Legal notices	311
Court cases	4
Fines	$30
Tenements vacated	2
Milk applications approved	141
Stable permits granted	1
Stable permits refused	1
Stable hearings	2
Dump permits granted	2

QUARANTINE.

Vessels inspected at quarantine	59
Total immigrants arriving in Boston	8,556

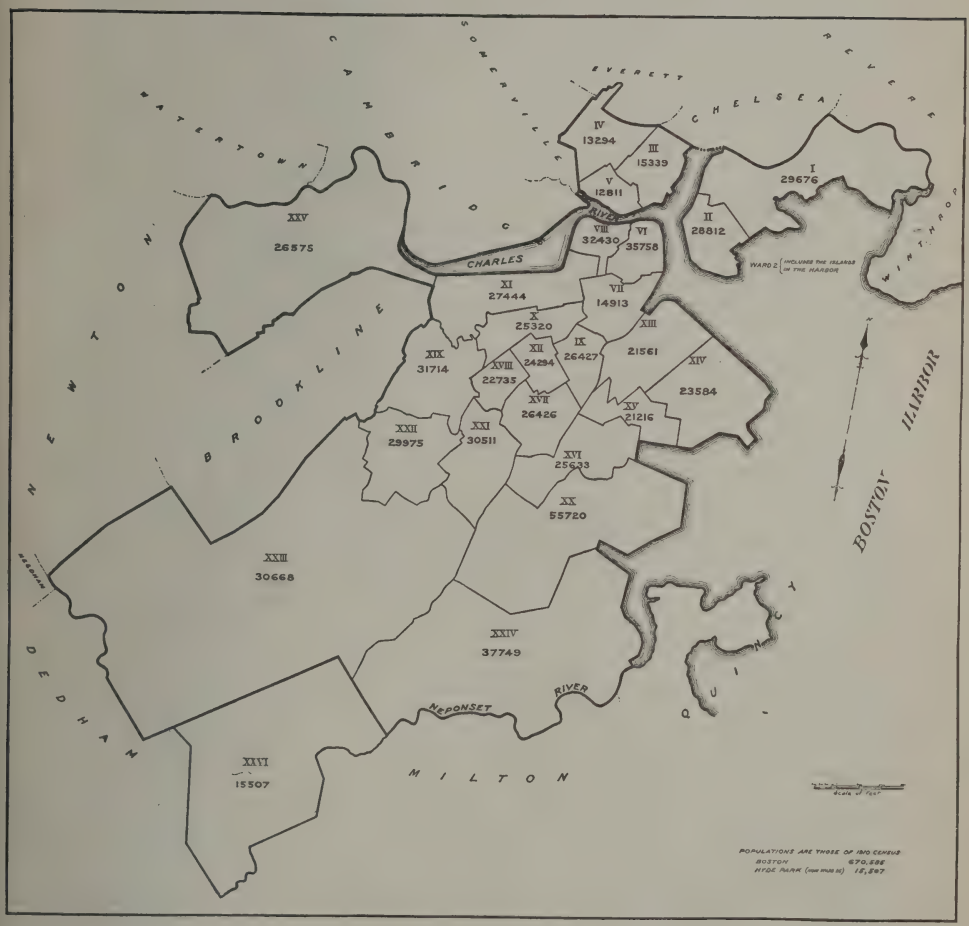
MONTHLY METEOROLOGICAL SUMMARY.

Taken at Weather Bureau, Boston, September, 1912.

Day.	Temperature, Degrees Fahrenheit.			Relative Humidity.	Daily Precipitation.	Actual Hours Sunshine.	Wind.		
	Maximum.	Minimum.	Mean.				Average Hourly Velocity. (Miles.)	Maximum Velocity. (Miles.)	Prevailing Direction.
1.....	68	53	60	84	.43	7.0	10.0	22	S. E.
2.....	62	54	58	86	.08	1.3	9.9	17	N. E.
3.....	67	59	63	91	T	6.3	5.9	10	E., S. E. E.
4.....	74	62	68	94	.01	7.2	5.1	12	W.
5.....	83	65	74	78	0	9.7	8.8	21	W.
6.....	75	68	72	83	.07	7.7	5.5	11	S. E.
7.....	78	63	70	88	0	6.3	8.0	18	S. W.
8.....	85	66	76	63	0	12.7	9.2	17	W.
9.....	80	62	71	62	0	12.8	7.5	15	N. W.
10.....	78	59	68	73	0	9.3	6.3	14	S. W.
11.....	90	60	75	70	.21	8.6	12.0	25	W.
12	68	53	60	54	0	12.3	7.3	14	N. W.
13.....	70	56	63	66	0	10.1	7.2	12	S. E. S. W., W.
14.....	76	61	68	76	0	6.6	10.9	20	S. W.
15.....	84	69	76	84	.03	6.7	10.3	18	S. W.
16.....	73	54	64	74	.77	7.3	10.8	26	S. W.
17.....	74	50	62	74	0	12.4	8.9	16	S. W.
18.....	76	60	68	84	T	6.4	12.2	25	S. W.
19.....	84	66	75	84	.02	6.2	8.0	14	S. W.
20.....	70	51	60	90	T	0	10.1	19	N. E.
21.....	56	47	52	84	T	1.4	11.2	19	N.
22.....	60	48	54	80	0	9.8	5.9	11	S. E.
23.....	62	49	56	73	0	5.8	5.2	13	S.E., S.W.
24.....	62	56	59	84	T	2.4	7.0	13	E.
25.....	63	53	58	86	T	9.4	9.4	16	N. E.
26.....	68	47	58	67	0	12.0	5.6	10	E. S.E., S.W.
27.....	66	53	60	76	0	0.2	8.8	15	N. W.
28.....	67	48	58	60	0	11.8	7.6	13	N. W.
29.....	63	48	56	78	.05	2.6	6.7	20	S. W.
30.....	59	40	50	52	0	11.8	12.5	27	N. W.
31.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
Totals.....	—	—	—	—	1.67	224.1	—	—	—
Means.....	71.4	56.0	63.7	76.6	0.06	60	8.5	.....	S. W.

Latitude 42 degrees 21 minutes. Longitude 71 degrees 4 minutes.

BOSTON WARD MAP.



Vol. 1 OCTOBER, 1912 No. 10

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF THE

CITY OF BOSTON

	Page
Smallpox and Vaccination	251
Regulation Respecting Burials	254
Vital Statistics, October, 1912	256
Monthly reports	266

CITY OF BOSTON
PRINTING DEPARTMENT
1912

ORGANIZATION OF THE HEALTH DEPARTMENT

FRANCIS X. MAHONEY, M. D., *Chairman.*
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

TRADES UNION LABEL COUNCIL

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, OCTOBER, 1912. NO. 10.

SMALLPOX AND VACCINATION.

THOMAS B. SHEA, M. D.
Chief Medical Inspector, Health Department.

Smallpox or variola in any community may be prevented by vaccination. This disease never prevails in a well vaccinated city. Quarantine demanded by the public will not, in itself, control the disease. Isolation of patients, although necessary, is a minor factor in checking the spread of the disease. Vaccination and revaccination furnishes the only protection and safety for a community. The German Empire is a model for all other countries and cities to follow. The law of Germany requires every child born in that country to be vaccinated between the ages of eight and twenty months, and revaccinated before he or she has reached the age of twelve years, and with what results? Smallpox is practically unknown and is considered a rare disease in that country.

The immunity acquired by vaccination has its limits, and vaccination in infancy will not protect an individual for the rest of his life. Vaccination in infancy and again in childhood will probably render the individual safe from an attack of smallpox. If a person is exposed to this disease, vaccination as late as the fourth day will protect. It is not safe to rely upon a previous vaccination after exposure. Immunity may have been lost and revaccination is necessary.

If a vaccination does not take, one may be assured of safety if the operation has been properly performed.

Vaccination is a surgical operation and should be performed by a qualified physician. Care should be taken that the arm is in a proper and cleanly condition before applying the virus, and parents and guardians should be instructed as regards the after care of the same.

Protection or immunity from smallpox in this city can only be obtained by the vaccination and revaccination of its citizens.

This protection cannot be acquired by a single vaccination in infancy. A study of this disease in Boston for the past thirty years shows conclusively that epidemics have occurred at intervals of ten to twelve years. As a result of the epidemic of 1893–4 the city was well vaccinated and the disease necessarily disappeared. From that time until 1901, the next outbreak, the city was free from this disease with the exception of occasional cases that are imported into every large city. In 1901, after a lapse of eight years, the majority of people had lost their protection, and the disease again appeared in an epidemic form, and before brought under control 1,500 cases and 277 deaths occurred. This great number of deaths from a preventable disease is a heavy toll for any community to pay when vaccination is free to all the citizens of this city, which will afford absolute protection from this disease.

In the past twenty-three years during which the writer has been connected with the Department of Health, our physicians, nurses, attendants and ambulance drivers have never contracted smallpox, and for this reason a rule of this department requires the frequent vaccination of all employees who have the charge and care of this disease.

When a case of smallpox is reported, it is immediately seen by a diagnostician, and if the case is confirmed the patient is immediately removed to the hospital, which is open at all times for the reception and care of patients. Apartments occupied by the patient are disinfected under the direction of a physician. All persons who have been exposed are immediately vaccinated and kept under observation for a period of sixteen days. The immediate neighborhood is also vaccinated. Physicians of the city are notified of the existence of the disease by a circular, as follows:

HEALTH DEPARTMENT, BOSTON, MASS.

.....191....

DEAR DOCTOR,— A case of smallpox was found by this department last evening in the ..... district. Patient has had opportunity to expose many people. Will you kindly notify this department if you see any suspicious eruption in order that the case may be promptly investigated.

Children attending school coming from infected houses are excluded from school unless protected by a recent successful vaccination.

The vaccine used in this city is made and furnished free of expense by the State Board of Health, and the success that has attended the use of this virus since its introduction speaks well for its purity and activity.

Cases Reported and Deaths from Smallpox in Boston.

Year.	Cases.	Deaths.	Percentages.
1872	2,592	738	28.4
1873	1,103	302	27.3
1874	7	2	28.5
1875	5	1	20.0
1876	6	2	33.33
1877	17	4	23.5
1878			
1879			
1880	4	1	25.0
1881	44		13.6
1882	24		33.3
1883	8		12.44
1884	1	1	100.0
1885	11	1	9.0
1886	1		
1887	4		
1888	8	1	12.4
1889	10	2	20.0
1890	1		
1891			
1892			
1893	26	4	15.3
1894	77	22	28.5
1895			
1896			
1897	10		
1898			
1899	29	5	17.24
1900	7		
1901	504	74	14.68
1902	1,024	190	18.55
1903	68	13	19.12
1904			
1905	5	1	20.00
1906	9		
1907	6		
1908			
1909	5	1	20.00
1910	17		
1911	1	1	100 00
1912	7		

STATE LAW CONCERNING VACCINATION.

SECT. 137. The board of health of a city or town if, in its opinion, it is necessary for the public health or safety shall require and enforce the vaccination and revaccination of all the inhabitants thereof and shall provide them with the means of free vaccination. Whoever refuses or neglects to comply with such requirement shall forfeit five dollars.

SECT. 138. The board of health of a city or town in which any incorporated manufacturing company, almshouse, reform or industrial school, hospital or other establishment where the poor or sick are received, prison, jail, or house of correction or any institution which is supported or aided by the Commonwealth is situated may, if it decides that it is necessary for the health of the inmates or for the public safety, require the authorities of said establishment or institution, at the expense thereof, to cause all said inmates to be vaccinated.

REGULATION RESPECTING BURIALS.

CITY OF BOSTON,
HEALTH DEPARTMENT, 100 SUMMER STREET,
BOSTON, October 18, 1912.

At a meeting of the Board of Health this day, it was voted to adopt the following regulation respecting burials:

Ordered, A public or church funeral shall not be held of any person who has died of smallpox, scarlet fever, yellow fever, typhus fever, Asiatic cholera or plague, but the funeral of such person shall be private. And it shall not be lawful to invite or permit at the funeral of any person who has died of any of the above diseases, or at any service connected therewith, any person whose attendance is not necessary.

No person shall retain or expose or assist in the retention or exposure of a dead body of any such person except in a coffin or casket properly sealed, nor shall he allow any such body to be placed in any coffin or casket unless the body has been washed in a 1–500 solution of bichloride of mercury and wrapped in a sheet saturated with a proper disinfecting solution, and the coffin or casket shall then be immediately and permanently sealed.

No undertaker shall assist in a public or church funeral of any such person.

No person shall retain, expose, or allow to be retained or exposed unburied, the dead body of any human being for a longer time than four days, or where death has resulted from

smallpox, diphtheria (croup), scarlet fever, yellow fever, typhus fever, plague, or Asiatic cholera, for a longer time than forty-eight hours after the death of said person, without a permit from the Board of Health, which permit shall specify the length of time which such body may be retained unburied, but this regulation shall not apply to bodies retained in any public morgue in the City of Boston.

In diphtheria (croup), scarlet fever, typhoid fever, measles, tuberculosis, cerebro-spinal meningitis, acute anterior poliomyelitis, anthrax and glanders, the body must be disinfected and inclosed in a properly sealed casket, which must not be reopened. (A coffin with a glass face panel may be used if desired.)

It shall be the duty of every undertaker having notice of the death of any person within the City of Boston, from smallpox, diphtheria (croup), scarlet fever, yellow fever, typhus fever, plague, Asiatic cholera, or any other infectious or communicable disease dangerous to the general health of the community, or of the bringing of a dead body of any person who has died of any such disease in such city, to give immediate notice thereof to this department.

Ordered, That the regulation of April 17, 1912, concerning burials be and hereby is repealed.

A true copy.

Attest: F. H. Slack, *Secretary*.

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF OCTOBER, 1912.

Boston had 921 deaths in October, compared with 848 for October of last year; and a death rate of 15.06 against 14.49 for October, 1911.

There were 10 less deaths from tuberculosis (all forms) than in October, 1911.

Other important differences were as follows:

October, 1912, decreases compared with October, 1911:

Organic heart disease, Bright's disease and nephritis	16
Suicide	6

October, 1912, increases compared with October, 1911:

Pneumonia and broncho-pneumonia	36
"Other diseases"	27
Diarrhea and enteritis (under 2 years)	20

There were 23 more deaths under 1 year than in October, 1911, 39 more under 5 years, and 15 more over 60 years.

Ward 11 had the lowest rate, 7.13 and Ward 14 the highest, 19.92.

Deaths of nonresidents were 130 against 103 in October, 1911.

One hundred and eleven cases of diphtheria were reported against 196 in October, 1911, and 75 cases of scarlet fever against 126 last year. On the other hand there were 149 cases of measles against 105 in October, 1911, and 91 cases of whooping cough against 38 last year.

There were 195 deaths under 1 year, which is 4 less than the average for October for the preceding five years. Seventy of these deaths were due to premature birth, congenital debility, malformations and other diseases peculiar to early infancy; 68 to diarrhea and enteritis; 28 to pneumonia and broncho-pneumonia; 7 to reportable diseases; and 22 to other causes. Of these deaths under 1 year, Wards 15 and 20 had the largest number, 12 each, while Wards 2, 6 and 19 had 11 each. One hundred forty-one were over 2 weeks old and of these 117 were bottle fed.

VITAL STATISTICS.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
* Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	137.06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	‡298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston January 1, 1912, and became Ward 26. Under "Boston," in the above table, Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau.

‡ An infant asylum is located in this ward.

October. General Summary.

	1912.	1911.
Total deaths	921	848
Population, estimated*	720,031	688,912
Death rate per 1,000	15.06	14.49
Deaths of nonresidents	130	103
Corrected death rate†	12.93	12.73

*Population estimated by arithmetical method used by Census Bureau.
†Nonresidents not included.

October, 1912. Statement of Deaths.

Total number (stillbirths excluded)	921
Sex.	
Males	474
Females	447
Condition.	
Single	451
Married	286
Widowed	175
Divorced	7
Unknown	2
Color.	
White	896
Black (negro or mixed)	25
Chinese	0
Deaths of children:	
Under one year	195
Under two years	225
Under five years	253
Stillbirths during the month,	62

Nativity.	
United States	586
Ireland	153
England and Wales	22
Scotland	10
Germany	20
Canada	59
Italy	19
Russia and Poland	31
Sweden and Norway	7
France	1
Other countries	9
Unknown	4
Nativity of Mothers.	
United States	275
Ireland	284
England and Wales	29
Scotland	19
Germany	22
Canada	82
Italy	54
Russia and Poland	59
Sweden and Norway	13
France	2
Other countries	18
Unknown	64

Abridged List Class Number.	Causes of Death.	Totals. October, 1912.	Totals. October, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes..... {1912	921	.....	195	30	12	10	6	253	16	13	14
	{1911	.....	848	172	23	7	8	4	214	8	11	19
1	Typhoid fever.....	9	8	.....	.....	.....	.....	.....	.....	.....	1	.....
3	Malarial fever.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles.....	4	3	.....	2	.....	.....	1	3	1	.....	.....
6	Scarlet fever.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough.....	5	4	3	1	1	.....	.....	5	.....	.....	.....
8	Diphtheria and croup.....	6	5	.....	.....	2	1	.....	3	3	.....	.....
9	Influenza.....	2	3	.....	1	.....	.....	.....	1	.....	.....	.....
12	Other epidemic diseases.....	3	5	1	.....	.....	.....	.....	1	.....	.....	.....
13	Tuberculosis of the lungs.....	80	89	2	.....	.....	1	.....	3	1	2	4
14	Tuberculous meningitis.....	6	8	.....	2	.....	1	.....	3	.....	.....	.....
15	Other forms of tuberculosis.....	4	3	1	.....	.....	.....	1	2	.....	.....	1
16	Cancer, malignant tumor.....	65	64	.....	.....	1	.....	.....	1	.....	.....	1
17	Simple meningitis (except cerebro-spinal meningitis).	4	4	.....	1	.....	.....	.....	1	1	.....	.....
17a	Cerebro-spinal meningitis.....	1	3	1	.....	.....	.....	.....	1	.....	.....	.....
18	Apoplexy and softening of the brain,	44	42	.....	.....	.....	.....	.....	.....	.....	.....	.....
19	Organic heart diseases.....	110	104	.....	.....	.....	.....	.....	.....	.....	.....	2
20	Acute bronchitis.....	4	2	2	.....	.....	.....	.....	2	.....	.....	.....
21	Chronic bronchitis.....	1	6	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	77	54	12	5	2	1	.....	20	.....	1	1
22a	Broncho-pneumonia.....	32	19	16	7	.....	1	.....	24	.....	.....	.....
23	Other respiratory diseases.....	7	8	.....	1	.....	.....	.....	1	.....	2	.....
24	Diseases of the stomach (cancer excepted).	3	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
25	Diarrhea and enteritis (under two years).	75	52	68	7	.....	.....	.....	75	.....	.....	.....
26	Appendicitis and typhlitis.....	9	5	.....	.....	.....	.....	.....	.....	1	2	1
27	Hernia, intestinal obstruction.....	9	6	1	.....	.....	.....	1	2	.....	.....	.....
28	Cirrhosis of liver.....	9	9	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis.....	46	68	2	.....	.....	.....	.....	2	.....	.....	.....
30	Diseases of women (not cancer)...	9	2	.....	.....	.....	.....	.....	.....	.....	.....	1
31	Puerperal septicemia.....	3	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases.....	5	7	.....	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	56	56	55	.....	.....	1	.....	56	.....	.....	.....
34	Old age.....	5	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths.....	53	49	2	1	1	2	1	7	3	2	2
36	Suicide.....	7	13	.....	.....	.....	.....	.....	.....	.....	.....	.....
37	Other diseases.....	165	138	27	2	5	2	2	38	6	3	1
38	Ill-defined causes.....	3	1	2	.....	.....	.....	.....	2	.....	.....	.....

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex.		Abridged List Class Number.
															Males.	Females.	
30 24	35 38	39 29	54 47	49 47	43 53	60 56	50 52	57 55	60 58	52 52	38 33	33 31	16 12	9 9	474 487	447 361	
2	1	1	1	1	1	1	.....	.....	.....	.....	.....	.....	.....	.....	4	5	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	3	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	6
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	3	7
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	4	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	2	9
.....	.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....	.....	2	1	12
10	9	11	13	6	5	6	4	3	1	1	.....	1	.....	.....	47	33	13
.....	1	.....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	1	14
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	3	15
.....	.....	.....	5	8	7	5	9	8	8	5	6	1	.....	1	22	43	16
.....	1	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	1	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	17a
.....	.....	1	.....	1	.....	5	5	4	9	4	7	4	3	1	22	22	18
3	6	2	3	4	5	11	12	10	11	14	12	7	5	3	54	56	19
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	1	.....	.....	2	2	20
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	1	.....	21
2	2	3	5	4	6	3	2	7	9	6	1	2	2	1	34	43	22
.....	.....	.....	.....	1	1	2	.....	.....	1	.....	.....	1	2	.....	18	14	22a
.....	.....	.....	.....	.....	.....	.....	.....	2	1	.....	.....	1	.....	.....	5	3	23
.....	.....	.....	.....	.....	.....	.....	.....	1	1	.....	1	.....	.....	.....	1	2	24
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	39	36	25
1	.....	1	1	.....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	5	4	26
2	1	.....	.....	.....	.....	.....	1	.....	1	2	.....	.....	.....	.....	3	6	27
.....	.....	.....	2	1	1	1	.....	1	2	.....	1	.....	.....	.....	6	3	28
.....	1	3	4	3	4	7	5	2	5	5	4	1	.....	.....	24	22	29
.....	.....	1	1	3	1	1	.....	1	.....	.....	.....	.....	.....	.....	.....	9	30
1	1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	31
.....	1	3	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	32
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	30	26	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	1	1	2	1	4	34
4	6	2	2	5	2	3	1	5	2	5	.....	2	.....	.....	42	11	35
1	.....	.....	1	1	.....	3	.....	.....	.....	1	.....	.....	.....	.....	6	1	36
4	5	11	13	10	6	10	10	12	9	7	6	10	3	1	90	74	37
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	1	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence.										
			1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	921	31	31	17	22	20	44	23	27	35	27	18
	Rates per 1,000 population ..... {Oct., 1912	15.06	11.56	12.13	12.86	18.98	18.28	13.52	18.53	9.59	14.54	12.24	7.13
	{Oct., 1911	14.49	13.80	13.56	9.90	12.22	11.91	12.99	19.95	10.04	17.57	12.84	8.62
1	Typhoid fever	9	.....	.....	.....	.....	.....	.....	1	1	1	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	4	.....	.....	.....	.....	.....	2	.....	1	.....	.....	.....
6	Scarlet fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough	5	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
8	Diphtheria and croup	6	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
9	Influenza	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	3	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....
13	Tuberculosis of the lungs	80	2	2	3	3	4	1	1	3	2	1	1
14	Tuberculous meningitis	6	.....	1	1	.....	1	.....	.....	.....	.....	.....	.....
15	Other forms of tuberculosis	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
16	Cancer, malignant tumor	65	2	2	1	4	1	1	1	2	.....	1	2
17	Simple meningitis (except cerebro-spinal meningitis).	4	1	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
17a	Cerebro-spinal meningitis	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
18	Apoplexy and softening of the brain.	44	2	.....	1	1	1	2	1	1	2	2	.....
19	Organic heart diseases	110	5	1	3	2	2	6	3	1	3	4	5
20	Acute bronchitis	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1
21	Chronic bronchitis	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	77	6	2	1	.....	2	3	3	4	1	4	1
22a	Broncho-pneumonia	32	1	3	.....	2	1	5	1	.....	3	1	1
23	Other respiratory diseases	7	1	1	1	.....	.....	.....	.....	.....	2	.....	.....
24	Diseases of the stomach (cancer excepted).	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
25	Diarrhea and enteritis (under two years).	75	1	7	1	2	1	4	1	2	4	.....	.....
26	Appendicitis and typhlitis	9	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	1
27	Hernia, intestinal obstruction,	9	.....	.....	.....	.....	.....	1	.....	.....	2	.....	2
28	Cirrhosis of liver	9	.....	1	.....	.....	.....	.....	.....	3	.....	1	.....
29	Bright's disease and nephritis	46	1	3	.....	.....	2	.....	.....	.....	2	5	1
30	Diseases of women (not cancer),	9	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....
31	Puerperal septicemia	3	.....	.....	.....	.....	.....	2	.....	.....	.....	.....	.....
32	Other puerperal diseases	5	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	56	2	2	1	1	.....	1	1	2	1	2	1
34	Old age	5	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	53	1	.....	1	1	1	3	3	2	4	2	1
36	Suicide	7	.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....
37	Other diseases	165	5	6	3	6	3	11	7	4	5	4	1
38	Ill defined causes	3	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....
	Total deaths under one year	195	3	11	3	7	2	11	4	5	9	3	1

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number.
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
34	25	41	34	18	43	28	33	52	40	23	42	41	22	13	....	130	7	....
15.74	13.68	19.92	18.52	7.77	18.50	14.33	11.84	9.89	14.59	8.75	15.19	11.93	9.03	9.60	....	....	....	....
12.09	20.33	11.80	8.24	13.31	17.04	19.04	10.56	10.96	11.22	13.89	10.77	6.06	11.04	.....	....	....	....	....
.....	.....	2	1	1	.....	.....	.....	.....	1	.....	1	.....	.....	.....	....	.....	...	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	4
.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	6
.....	1	1	.....	.....	1	.....	2	.....	.....	.....	.....	.....	.....	.....	....	.....	...	7
.....	.....	1	.....	.....	.....	2	.....	.....	2	.....	.....	.....	.....	.....	....	.....	...	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	....	1	...	9
.....	.....	1	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	12
3	3	4	2	1	4	4	8	3	3	4	5	2	2	.....	....	9	...	13
.....	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	....	1	...	14
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	....	3	...	15
3	3	4	3	.....	2	.....	1	2	5	.....	5	4	1	.....	....	15	...	16
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	17
.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	17a
6	.....	1	1	.....	2	1	1	3	3	1	3	2	3	.....	....	4	...	18
5	3	.....	3	2	2	2	6	9	4	3	3	9	5	1	....	18	...	19
.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	2	.....	.....	....	.....	...	20
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	.....	...	21
1	3	4	1	4	6	2	3	4	5	1	2	4	1	3	....	5	1	22
1	1	.....	2	.....	.....	2	1	1	.....	2	1	.....	1	.....	....	1	1	22a
1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	....	.....	...	23
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	....	2	...	24
2	6	4	8	1	6	.....	1	.....	2	.....	2	2	2	2	....	9	5	25
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	1	2	1	.....	.....	....	2	...	26
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	1	....	2	...	27
.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	2	.....	1	.....	....	.....	...	28
1	1	2	1	1	4	1	.....	3	5	1	4	2	2	1	....	3	...	29
1	.....	.....	.....	.....	.....	1	.....	1	1	.....	.....	.....	.....	.....	....	4	...	30
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	31
.....	.....	.....	.....	1	1	.....	.....	.....	1	.....	.....	.....	.....	.....	....	2	...	32
1	.....	4	2	.....	.....	.....	6	10	2	4	4	4	.....	.....	....	5	...	33
1	.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....	1	....	1	...	34
1	2	.....	1	1	4	4	.....	1	.....	1	1	1	1	1	....	15	...	35
1	.....	1	.....	.....	.....	1	.....	.....	.....	.....	1	.....	.....	.....	....	1	...	36
5	2	11	8	4	9	4	2	14	5	5	6	8	2	1	....	24	...	37
1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	38
4	10	10	12	4	9	2	11	12	4	6	8	9	5	2	....	21	7	

VITAL STATISTICS.

October Infant Mortality.

Detailed List Class Number.	Causes of Death.	October Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	195	172	19	10	4	13	8	12	2	16	24	38	24	25	24	117	21
	Male	104	117	12	5	3	6	4	8	...	10	9	23	13	11	10	64	12
	Female	91	55	7	5	1	7	4	4	2	6	15	15	11	14	14	53	9
	White	193	168	18	10	4	13	8	12	2	16	24	38	23	25	24	116	21
	Colored	2	4	1	...	...	...	...	...	...	...	...	...	1	...	.....	1	...
1	Typhoid fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
5	Smallpox	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
6	Measles	.....	2	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
7	Scarlet fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
8	Whooping cough	3	3	...	...	...	...	...	...	...	...	...	1	...	2	2	1	...
9	Diphtheria and croup	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
10	Influenza	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
14	Dysentery	1	2	...	...	...	...	...	...	...	...	...	1	...	...	.....	1	...
18	Erysipelas	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
19	Other epidemic diseases	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
20	Pus-infection and septicemia	1	1	...	...	...	...	...	...	...	1	...	...	...	...	.....	1	1
24	Tetanus	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
28	Tuberculosis of the lungs	1	3	...	...	...	...	...	...	...	...	...	1	...	...	.....	1	...
29	Acute miliary tuberculosis	1	1	...	...	...	...	...	...	...	...	...	1	...	...	.....	1	1
30	Tuberculous meningitis	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
31|35	Other forms of tuberculosis	1	.....	...	...	...	...	...	...	...	...	...	...	...	1		1	1
36	Rickets	1	.....	...	...	...	...	...	...	...	1	...	...	...	...	.....	1	1
37	Syphilis	3	7	...	...	...	...	...	1	...	1	...	1	...	...	.....	3	1
38	Gonococcus infection	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
61	Simple meningitis	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
61a	Cerebro-spinal fever	1	1	...	...	...	...	...	...	...	...	...	1	...	...	1	.....	...
63a	Acute poliomyelitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
71	Convulsions	2	.....	...	...	...	...	...	1	1	...	...	...	...	...	2	.....	...
76	Diseases of the ears	1	.....	...	...	...	...	...	...	...	...	...	1	...	...	.....	1	...
79	Organic diseases of the heart	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
89	Acute bronchitis	2	1	...	...	...	1	...	1	...	...	...	...	...	...	.....	1	...
91	Broncho-pneumonia	16	9	...	...	...	1	...	...	...	2	1	7	2	3	1	14	1
92	Pneumonia	12	6	...	...	...	1	...	2	...	2	1	2	1	3	5	6	...
93	Pleurisy	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
103	Other diseases of stomach	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...

October Infant Mortality.— *Concluded.*

Detailed List Class Number.	Causes of Death.	October Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
104	Diarrhea and enteritis	68	50	...	...	...	...	...	2	1	6	17	15	15	12	7	61	8
108	Appendicitis and typhlitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
109	Hernias, intestinal obstruction,	1	...	...	...	...	...	...	...	...	...	...	...	1	...	...	1	1
117	Simple peritonitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
119	Acute nephritis	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
143	Furuncle	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
144	Acute abscess	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
145	Other diseases of skin, etc.	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
150*a*	Hydrocephalus	...		...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
b	Congenital malformations of heart.	11	14	3	2	...	3	...	1	...	...	...	1	1	...	3	...	1
c	Other malformations	5		...	...	...	...	1	1	...	1	1	...	1	...	2	2	1
151*a*	Premature birth	25	41	10	6	1	3	3	...	...	1	1	...	...	...	...	2	1
b	Congenital debility	14		1	...	...	...	3	1	...	1	3	4	...	1	...	10	1
152*a*	Injuries at birth	9	21	5	1	1	1	...	1	...	...	...	...	...	...	...	1	...
b	Other causes peculiar to early infancy.	6		...	1	2	2	1	...	...	...	...	...	...	...	...	...	1
167	Burns (conflagrations excepted).	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
168	Absorption of deleterious gases,	1	...	...	...	...	...	...	...	...	...	...	...	1	...	...	1	...
172	Traumatism by fall	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
182, 184	Homicide	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
187, 189	Ill-defined diseases	2	1	...	...	...	...	...	...	...	...	...	...	1	1	...	2	...
	Other causes	7	4	...	...	...	1	...	1	...	...	...	2	1	2	1	5	1
	Breast fed *	24	26	...	...	...	...	...	3	1	3	3	7	1	6	24	...	...
	Bottle fed *	117	86	...	...	...	...	...	9	1	13	21	31	23	19	...	117	18
	Nonresidents	21	23	1	1	...	1	...	1	...	4	2	3	7	1	...	18	21

* Aged two weeks and over.

Additional Deaths for Other Months.

Sept. 1912.— 1 female; anemia; white; aged 45 years; single; residence Ward 11; born in United States; mother born in Ireland.

1 male; pneumonia; white; aged 55 years; widowed; residence Ward 7; born in Canada; mother born in Canada.

1 male; simple peritonitis; white; aged 42 years; condition unknown; residence Ward 9; birthplace unknown; birthplace of mother unknown.

1 male; Brights' disease; white; aged 21 years; single; nonresident; born in United States; mother born in Canada.

DIVISION OF COMMUNICABLE DISEASES, OCTOBER, 1912.

Medical Inspectors.

New cases visited:	
Diphtheria:	
a. Isolation	51
b. Diagnosis	8
Scarlet fever:	
a. Isolation	47
b. Diagnosis	18
c. Release	9
Typhoid fever	32
Measles:	
a. Isolation	9
b. Diagnosis	5
Varicella:	
a. Isolation	2
b. Diagnosis	14
Epidemic cerebro-spinal meningitis	1
Ophthalmia neonatorum	14
Tuberculosis	58
Deaths investigated	20

Nurses.

New cases visited:	
Diphtheria	96
Scarlet fever	71
Typhoid fever	69
Poliomyelitis	5
Whooping cough	76
Ophthalmia neonatorum	99
Mumps	24
Measles	148
Varicella	55
Malaria	4
Cerebro-spinal meningitis	3
Old cases visited:	
Diphtheria	176
Scarlet fever	130

Typhoid fever	249
Poliomyelitis	11
Whooping cough	134
Ophthalmia neonatorum	223
Mumps	33
Measles	249
Varicella	76
Cerebro-spinal meningitis	7
Release cultures taken for diphtheria	65
Vaccinations performed	59
Certificates granted	54

Forcible Removals.

Tuberculosis	3
Specific disease	2
Diphtheria	1

Disinfections.

Diphtheria	107
Scarlet fever	61
Phthisis	198
Infected bedding, etc.	1 lot
Infected books, etc.	3 lots
Infected clothing, etc.	2 lots
Infected carriages	1

October, 1912. Cases Reported.

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum.
1	1	....	....	....	....	4	....	....	....	....	2	....	4
2	1	....	....	....	....	11	....	....	....	....	2	2	6
3	....	....	....	....	....	1	....	....	....	....	.....	1	3
4	....	....	....	....	....	.....	....	....	....	....	1	....	3
5	....	....	....	....	....	.....	....	....	....	....	.....	....	....
6	....	....	....	....	....	10	....	....	1	....	19	18	7
7	....	....	....	....	....	3	....	....	....	....	15	....	4
8	....	....	....	....	....	4	....	....	....	....	7	....	22
9	....	....	....	....	....	7	....	....	....	....	31	....	5
10	....	....	....	....	....	4	....	....	1	....	18	1	....
11	....	....	....	....	....	.....	....	....	....	....	.....	....	1
12	....	....	....	....	....	4	....	....	....	....	10	....	2
13	....	....	....	....	....	4	....	....	....	....	2	1	3
14	....	....	....	....	....	2	....	....	....	....	4	1	2
15	....	....	....	....	....	2	....	....	....	....	3	1	....
16	....	....	....	....	....	2	....	....	....	....	1	....	1
17	....	....	....	....	....	1	....	....	....	....	.....	....	4
18	....	....	....	....	1	2	....	....	....	....	6	....	7
19	1	....	....	....	....	7	....	....	....	....	5	....	4
20	1	....	....	....	....	6	....	....	....	....	3	1	8
21	1	....	....	....	....	9	....	....	....	....	1	1	3
22	....	....	....	....	....	5	....	....	1	....	7	1	3
23	....	....	....	....	1	.....	....	....	1	....	2	1	....
24	....	....	....	....	....	2	....	....	....	....	6	....	5
25	....	....	....	....	1	5	....	....	....	....	2	....	1
26	....	....	....	....	....	.....	....	....	....	....	2	....	1
Total	5	....	....	....	3	95	....	....	4	....	149	29	99
Unknown	....	....	....	....	....	.....	....	....	....	....	.....	....	....
Nonresidents	....	....	....	....	....	16	....	....	....	....	.....	....	7
Grand total	5	....	....	....	3	111	....	....	4	....	149	29	106
Corresponding month last year	6	....	....	....	3	196	....	....	4	....	105	10	104

COMMUNICABLE DISEASES.

Cases Reported. **October, 1912**

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
4	....	....	....	....	4	1	2	....	1	2	....	 1
7	....	....	....	....	15	....	4	....	1	2	....	 2
.....	....	....	....	....	2	....	2	....	.....	1	....	 3
.....	....	....	....	....	7	....	1	....	3	1	....	 4
.....	....	....	....	....	7	....	1	....	.....	.....	....	 5
2	....	....	....	....	15	....	4	....	2	5	....	 6
1	....	....	....	....	23	....	....	....	1	.....	....	 7
6	....	....	....	....	18	....	2	....	5	1	....	 8
2	....	....	....	....	20	....	3	....	5	4	....	 9
1	....	....	....	....	8	....	6	....	.....	1	....	10
3	....	....	....	....	4	....	....	....	.....	2	....	11
2	....	....	....	....	8	....	3	....	2	2	....	12
.....	....	....	....	....	6	....	1	....	4	5	....	13
3	....	....	....	....	11	....	2	....	.....	24	....	14
1	....	....	....	....	6	....	4	....	2	3	....	15
4	....	....	....	....	14	....	4	....	4	.....	....	16
.....	....	....	....	....	7	....	3	....	1	21	....	17
1	....	....	....	....	17	2	1	....	6	3	....	18
5	....	....	....	....	9	1	3	....	1	4	....	19
2	....	....	....	....	16	1	6	....	10	.....	....	20
3	....	....	....	....	5	....	2	....	1	2	....	21
3	....	....	....	....	5	....	4	....	.....	1	....	22
10	....	....	....	....	7	1	1	....	3	.....	....	23
3	....	....	....	....	10	....	2	....	1	4	....	24
4	....	....	....	....	5	....	5	....	1	1	....	25
1	....	....	....	....	3	....	1	....	1	2	....	26
68	....	....	....	....	252	....	67	....	55	91	....	.....Total
.....	....	....	....	....	5	1	....	....	.....	.....	....	.....Unknown
7	....	....	1	....	19	7	6	....	.....	.....	....	.....Nonresidents
75	....	....	1	....	276	14	73	....	55	91	....	.....Grand total
126	....	2	....	....	270	....	75	....	74	38	....	Corresponding month last year.

DIVISION OF CHILD HYGIENE.—OCTOBER, 1912.

1. Medical Inspection of Schools.

Number inspections made	21,917
Number physical examinations made	23,544
Number visits made to homes	80

There were 2,889 pupils excluded from schools during the month on account of contagious diseases, as follows:

Diphtheria	5	Pediculosis	1,861
Scarlet fever	3	Trachoma	4
Measles	8	Acute or purulent conjunctivitis	33
German measles	1	Ringworm	40
Chicken pox	23	Scabies	69
Whooping cough	13	Impetigo	98
Mumps	17	Favus	1
Pulmonary tuberculosis	3	Erysipelas	1
Acute tonsilitis	86	Miscellaneous	621
Influenza	2		

There were 25,938 cases of noncontagious disease found, subdivided as follows:

Diseases of oral and respiratory tract	6,572
Diseases of ear	97
Diseases of eye	731
Diseases of skin	1,176
Dental caries	9,208
Miscellaneous diseases	8,154

2. Physical Examination of Licensed Minors.

There were 523 children between the ages of 14 and 16 years examined during the month. One hundred and forty-six were found to be without defects and 377 with defects as follows:

Defective eyesight	75	Defective palate	1
Hypertrophied tonsils	129	Skin disease	5
Defective teeth	270	Defective breathing	18
Cardiac disease	9	Orthopedic defects	1
Defective hearing	2	Cervical glands	29
Pulmonary disease	2	Miscellaneous	87

3. Post-Natal Work.

Cases	1,294	Bottle-fed babies	208
Visits	4,380	Breast and bottle-fed	89
Breast-fed babies	997		

Defective Conditions Noted.

Improper feeding	55	Skin disease	4
Otitis media	5	Pneumonia	3
Whooping cough	4	Miscellaneous	3
Ophthalmia	24		

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:		
Positive for diagnosis	76	
Positive for release	34	
Negative for diagnosis	697	
Negative for release	117	
"No growth" cultures	14—	938
TUBERCULOSIS:		
Positive	80	
Negative	300	
Unsatisfactory	0—	380
TYPHOID:		
Positive	45	
Negative	11	
Atypical	162—	218

GLANDERS:	Strauss.	C. F.	Ag.		
Positive	2	28	21	51	
Atypical	0	4	12	16	
Negative	3	93	90	186	
Unsatisfactory	0	0	0	0—	253

GONORRHEA:		
Positive	47	
Negative	125	
Unsatisfactory	0—	172
GONORRHEAL OPHTHALMIA:		
Positive	2	
Negative	47	
Unsatisfactory	0—	49
OTHER EXAMINATIONS:		
*Positive	7	
Negative	144	
Unsatisfactory	1—	162
BACTERIOLOGICAL MILK EXAMINATIONS	523	523
Bacteriological ice cream examinations	27	27
Total	2,722	2,722

SPECIAL WORK:

Longevity of tubercle bacilli in cow feces.

Testing the toxicity of washings from the mouths of diphtheria patients.

* K-L Vir. smear for T. B., organisms, typhoid feces, malaria, G-U. T. B., paratyphoid, Vincent's angina, cholera. Rats for plague; identification of rats autopsied in October, 1912, mus novegicus (39).

INSPECTION OF MILK, VINEGAR, ETC.

Examination as to Statute Requirements.

Samples examined, milk from stores	599
" " milk from wagons	757
" " milk brought in by citizens	50
" " ice cream	1
" " milk for bacteriological examination	523
" " ice cream for bacteriological examination	27
" " vinegar	88
" " butter and cheese	7
" " eggs	4
Total samples	2,056

REPORT OF DAIRY DIVISION FOR OCTOBER.

INSPECTION OF DAIRIES.

Satisfactory on first inspection	193	
Satisfactory on later inspection	212	
		405
Unsatisfactory on first inspection	97	
Unsatisfactory on later inspection	46	
		143
Total number of inspections		548
Dairies with milk rooms	289	
Dairies without milk rooms	259	
Sale of milk prohibited from dairies	21	
Cows inspected	6,437	

Receipts.	Quarts.	*Shipments.*	Quarts.	*Pasteurized.*	Quarts.
Milk	932,856	Milk in bottles	367,452	Milk	843,221
Cream	66,921	Milk in cans	522,397	Cream	62,754
Skimmed milk	24,826	Cream in bottles,	6,804	Skimmed milk	20,746
Certified milk	2,797	Cream in cans	56,236	Certified milk	none.
Inspected milk,	5,379	Skimmed milk	16,824		
Modified milk	127	Certified milk	2,133		
		Inspected milk	5,074		
		Modified milk	101		

Average temperature of milk in car, 44 degrees Fahrenheit.

"Satisfactory" means having a score of at least 45 per cent. by the government score card.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	970	Cattle condemned (6 and parts),	5,254 lbs.
Calves inspected	550	Calves condemned (4)	144 lbs.
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	5,725	Swine condemned (11 and parts),	3,899 lbs.

INSPECTION OF PROVISIONS.—ARTICLES CONDEMNED.

Meats.		Miscellaneous.	
Bear meat (tainted)	299 lbs.	Fish (tainted)	926 lbs.
Veal (immature)	32 lbs.	Vegetables	10 bush.
Beef (tainted)	343 lbs.	Fruit	10 bush.
Poultry (tainted)	524 lbs.	Canned goods (tainted)	34 cans.
Veal (tainted)	45 lbs.		

SANITARY INSPECTION DIVISION.

New reports	2,406
Reinspections	8,819
New tenement house reports	880
Nuisances reported	4,510
Legal notices	520
Court cases	6
Fines	$75
Tenements vacated	3
Milk applications approved	67
House demolished	1
Stable permits granted	4
Stable permits refused	1
Stable hearings	5
Dump permits	3

QUARANTINE.

Vessels inspected at quarantine	58
Total immigrants arriving in Boston	7,128

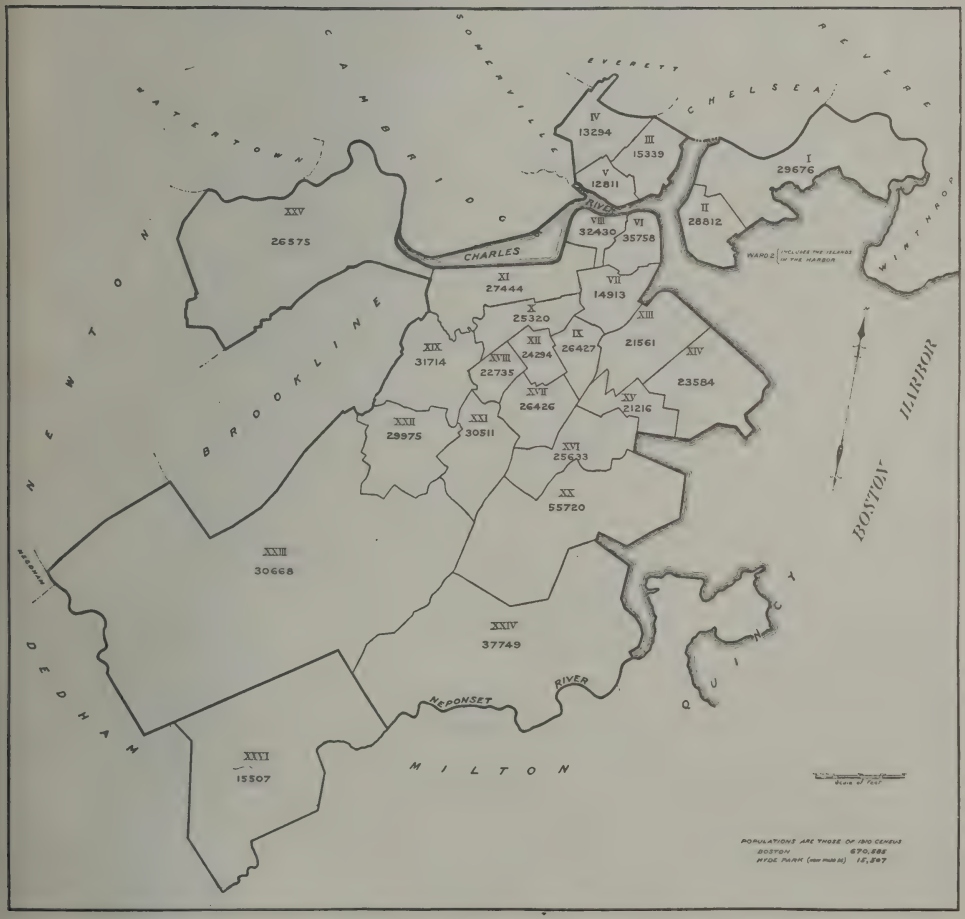
MONTHLY METEOROLOGICAL SUMMARY.

Taken at Weather Bureau, Boston, October, 1912.

Day.	Temperature, Degrees Fahrenheit.			Relative Humidity.	Daily Precipitation.	Actual Hours Sunshine.	Wind.		
	Maximum.	Minimum.	Mean.				Average Hourly Velocity. (Miles.)	Maximum Velocity. (Miles.)	Prevailing Direction.
1.....	62	45	54	64	T	4 3	12.6	26	S. W.
2.....	57	40	48	54	0	10.5	12.6	23	W.
3.....	72	48	60	71	0	9.9	12.7	22	S. W.
4.....	77	60	68	73	0	7.6	12.3	20	S. W.
5.....	78	57	68	62	0	11.6	6.0	11	W.
6.....	82	55	68	50	0	11.5	6.1	13	W.
7.....	86	56	71	55	T	11.5	12.2	26	S. W.
8.....	60	47	54	43	0	11.4	10.8	25	N. W.
9.....	65	46	56	61	T	5.2	8.1	16	S.
10.....	69	57	63	76	.02	8.8	6.6	13	E.
11.....	58	54	56	92	.04	0	6.1	12	S. E.
12.....	69	54	62	92	T	0	6.6	20	S. W.
13.....	68	55	62	56	0	8.3	10.0	19	W.
14.....	61	51	56	57	0	0.1	10.3	16	W.
15.....	64	42	53	55	0	9.1	15.5	31	W. N.W.
16.....	57	36	46	42	0	11.0	12.1	21	W.
17.....	73	42	58	44	0	11.0	11.8	20	S. W.
18.....	75	50	62	68	0	11.0	10.0	18	S. W.
19.....	71	54	62	86	.02	0.9	11.4	24	S. W.
20.....	63	49	56	52	0	10.9	10.5	24	N. W.
21.....	56	44	50	73	0	9.8	7 6	16	E.
22.....	59	48	54	82	0	9.9	7.8	17	S. E.
23.....	71	55	63	92	.52	0 6	9.5	24	E.
24.....	67	55	61	96	.10	1.6	7.2	16	E.
25.....	59	52	56	86	.23	1.1	6.5	14	S. E.
26.....	63	51	57	81	.07	1.8	7.5	12	W.
27.....	63	44	54	54	0	10.6	10.4	18	N. W.
28.....	58	41	50	62	0	8.6	8.6	15	N. W.
29.....	51	37	44	65	0	8.8	6.5	12	N.W., E.
30.....	72	48	60	70	0	8.1	11.8	26	W.
31.....	58	45	52	55	0	10.4	8.0	13	N. W.
Totals.....	—	—	—	—	1.00	225.9	—	—	—
Means.....	65.9	49.0	57.5	66.7	0.03	6.6	9.5	.....	West

Latitude 42 degrees 21 minutes. Longitude 71 degrees 4 minutes.

BOSTON WARD MAP.



Vol. 1 NOVEMBER, 1912 No. 11

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF THE

CITY OF BOSTON

PAGE
Vital Statistics, November, 1912 279
Monthly reports 290

CITY OF BOSTON
PRINTING DEPARTMENT
1912

ORGANIZATION OF THE HEALTH DEPARTMENT

FRANCIS X. MAHONEY, M. D., *Chairman.*
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

ELLIS PRINTING
TRADES UNION LABEL COUNCIL
BOSTON MASS

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, NOVEMBER, 1912. No. 11.

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF NOVEMBER, 1912.

Boston had 920 deaths in November, compared with 791 for November of last year; and a death rate of 15.55 against 13.97 for November, 1911.

Of deaths from reportable diseases, compared with November, 1911, the principal decreases were typhoid fever, 7; scarlet fever, 4; diphtheria and croup, 2; and cerebro spinal meningitis, 2; and the principal increase was tuberculosis (all forms), 19.

Other important differences were as follows:

November, 1912, decreases compared with November, 1911:

Congenital debility and malformations	8
Ill defined causes	6

November, 1912, increases compared with November, 1911:

Organic heart disease, Bright's disease and nephritis	49
"Other diseases"	21
Pneumonia and broncho-pneumonia	14
Diarrhea and enteritis	14
Violent deaths	12
Cancer	6

Ward 8 had the lowest rate, 9.17, and Ward 5 the highest, 17.94.

Deaths of nonresidents were 112 against 89 in November, 1911.

There were 7 more deaths under 1 year than in November, 1911, 11 more under 5 years, and 51 more over 60 years.

There were 146 deaths under 1 year, which is 3 less than the average for November for the preceding five years. Fifty-five of these deaths were due to premature birth, congenital debility, malformations and other diseases peculiar to early

infancy; 32 to diarrhea and enteritis; 25 to pneumonia and broncho-pneumonia; 8 to reportable diseases; and 26 to other causes.

Of these deaths under 1 year, Ward 6 had the largest number, 16, and Ward 2 came next with 11. Ninety-eight were over 2 weeks old and of these 68 were bottle fed.

One hundred and sixty-eight cases of diphtheria were reported against 180 in November, 1911, and 30 cases of typhoid against 61 last year. On the other hand there were 384 cases of measles against 119 in November, 1911; 261 cases of tuberculosis against 205 last year; 124 cases of scarlet fever against 103 last year; and 118 cases of whooping cough against 55 last year.

VITAL STATISTICS.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
* Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	137.06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	‡298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston January 1, 1912, and became Ward 26. Under "Boston," in the above table, Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau.

‡ An infant asylum is located in this ward.

VITAL STATISTICS.

November. General Summary.

	1912.	1911.
Total deaths	920	791
Population, estimated*	720,031	688,912
Death rate per 1,000	15.55	13.97
Deaths of nonresidents	112	89
Corrected death rate†	13.65	12.40

*Population estimated by arithmetical method used by Census Bureau.
†Nonresidents not included.

November, 1912. Statement of Deaths.

Total number (stillbirths excluded)	920
Sex.	
Males	493
Females	427
Condition.	
Single	412
Married	328
Widowed	176
Divorced	3
Unknown	1
Color.	
White	894
Black (negro or mixed)	24
Chinese	2
Deaths of children:	
Under one year	146
Under two years	178
Under five years	199
Stillbirths during the month,	70

Nativity.	
United States	569
Ireland	142
England and Wales	21
Scotland	9
Germany	15
Canada	79
Italy	25
Russia and Poland	23
Sweden and Norway	7
France	2
Other countries	20
Unknown	8
Nativity of Mothers.	
United States	242
Ireland	284
England and Wales	27
Scotland	20
Germany	20
Canada	89
Italy	67
Russia and Poland	42
Sweden and Norway	12
France	3
Other countries	28
Unknown	84

Abridged List Class Number.	Causes of Death.	Totals. November, 1912.	Totals. November, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes.....{1912 / 1911	920 /	..... / 791	146 / 139	32 / 31	10 / 6	6 / 10	5 / 2	199 / 188	10 / 13	13 / 10	22 / 15
1	Typhoid fever	4	11	.....	.....	.....	.....	.....	.....	.....	.....	.....
3	Malarial fever	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	6	6	1	3	.....	1	.....	5	1	.....	.....
6	Scarlet fever	.....	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough	5	5	2	.....	1	1	.....	4	1	.....	.....
8	Diphtheria and croup	5	7	.....	1	.....	.....	1	2	2	.....	1
9	Influenza	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	3	2	1	.....	.....	.....	.....	1	.....	.....	.....
13	Tuberculosis of the lungs	86	70	1	1	.....	.....	.....	2	1	.....	5
14	Tuberculous meningitis	9	7	3	2	2	.....	.....	7	.....	1	1
15	Other forms of tuberculosis	4	3	.....	.....	1	.....	.....	1	.....	1	1
16	Cancer, malignant tumor	75	69	.....	.....	.....	.....	.....	.....	.....	.....	.....
17	Simple meningitis (except cerebro-spinal meningitis).	3	1	1	1	.....	.....	.....	2	.....	.....	.....
17a	Cerebro-spinal meningitis	2	4	1	1	.....	.....	.....	2	.....	.....	.....
18	Apoplexy and softening of the brain,	58	41	.....	.....	.....	.....	.....	.....	.....	.....	.....
19	Organic heart diseases	130	93	.....	1	.....	.....	.....	1	.....	6	3
20	Acute bronchitis	9	10	4	2	.....	.....	1	7	.....	.....	.....
21	Chronic bronchitis	8	7	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	72	56	11	9	1	1	.....	22	.....	1	.....
22a	Broncho-pneumonia	31	33	14	6	3	1	1	25	.....	.....	.....
23	Other respiratory diseases	4	7	.....	.....	.....	.....	.....	.....	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	7	4	2	.....	.....	.....	.....	2	.....	.....	.....
25	Diarrhea and enteritis (under two years).	34	20	32	2	.....	.....	.....	34	.....	.....	.....
26	Appendicitis and typhlitis	5	5	.....	.....	.....	.....	.....	.....	1	.....	2
27	Hernia, intestinal obstruction	9	8	1	.....	.....	.....	.....	1	.....	.....	.....
28	Cirrhosis of liver	9	7	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	61	49	2	.....	.....	.....	.....	2	.....	.....	.....
30	Diseases of women (not cancer)	2	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	4	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	6	8	.....	.....	.....	.....	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	41	49	41	.....	.....	.....	.....	41	.....	.....	.....
34	Old age	3	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	54	42	2	.....	1	1	1	5	3	3	5
36	Suicide	13	12	.....	.....	.....	.....	.....	.....	.....	.....	.....
37	Other diseases	152	131	24	3	1	1	1	30	1	1	4
38	Ill-defined causes	6	12	3	.....	.....	.....	.....	3	.....	.....	.....

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex.		Abridged List Class Number.
															Males.	Females.	
29	37	37	50	57	51	64	70	77	67	57	44	23	8	5	493	427	
16	30	32	58	49	52	59	39	60	47	46	37	21	12	7	407	384	
3	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	2	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	4	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	6
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	2	7
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	3	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	9
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	1	.....	.....	.....	1	2	12
8	7	13	10	17	8	8	4	2	1	.....	.....	.....	.....	.....	57	29	13
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	5	14
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	1	15
.....	1	2	5	5	5	11	9	9	9	12	6	1	.....	.....	37	38	16
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	2	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	17a
.....	1	.....	.....	.....	3	4	6	10	12	11	5	5	.....	1	30	28	18
2	5	1	3	8	13	10	9	22	14	13	13	4	3	.....	55	75	19
.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	1	.....	.....	4	5	20
.....	.....	.....	.....	.....	.....	.....	1	1	2	2	1	.....	.....	1	1	7	21
2	6	4	4	1	4	5	6	4	4	5	2	2	.....	.....	42	30	22
.....	.....	1	1	1	.....	.....	.....	1	2	.....	.....	.....	.....	.....	14	17	22a
.....	.....	1	.....	.....	1	.....	.....	.....	.....	1	.....	.....	.....	1	2	2	23
.....	.....	.....	1	.....	.....	.....	1	2	.....	.....	.....	.....	.....	1	3	4	24
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	20	14	25
1	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	.....	26
.....	.....	2	1	.....	1	.....	1	2	.....	1	.....	.....	.....	.....	2	7	27
.....	.....	.....	2	3	1	1	.....	2	.....	.....	.....	.....	.....	.....	5	4	28
.....	1	3	3	2	6	7	10	10	9	2	4	1	1	.....	32	29	29
.....	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....	.....	.....	.....	.....	2	30
1	1	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	31
2	.....	2	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	6	32
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	25	16	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	2	.....	.....	3	34
6	5	3	3	3	3	1	5	.....	4	2	.....	1	1	1	46	8	35
.....	2	.....	5	1	1	1	.....	2	1	.....	.....	.....	.....	.....	6	7	36
4	8	3	9	14	4	15	17	8	8	6	12	7	1	.....	85	67	37
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	2	.....	.....	.....	.....	3	3	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence.										
			1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	920	42	32	21	17	19	51	19	25	39	23	28
	Rates per 1,000 population (Nov., 1912)	15.55	16.18	12.94	16.42	15.15	17.94	16.19	15.81	9.17	16.74	10.77	11.47
	(Nov., 1911)	13.97	11.49	14.84	15.74	16.24	17.04	12.77	18.97	11.12	15.50	9 95	7.63
1	Typhoid fever	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	6	.....	1	1	.....	.....	2	.....	.....	.....	1	.....
6	Scarlet fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
7	Whooping cough	5	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
8	Diphtheria and croup	5	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....
9	Influenza	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	3	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
13	Tuberculosis of the lungs	86	3	1	2	1	2	3	3	2	7	3	3
14	Tuberculous meningitis	9	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....
15	Other forms of tuberculosis	4	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
16	Cancer, malignant tumor	75	3	1	2	.....	.....	3	1	.....	2	2	5
17	Simple meningitis (except cerebro-spinal meningitis).	3	.....	1	.....	.....	.....	1	.....	.....	.....	.....	.....
17a	Cerebro-spinal meningitis	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
18	Apoplexy and softening of the brain.	58	2	2	.....	1	3	2	2	1	3	.....	.....
19	Organic heart diseases	130	5	4	2	3	2	8	2	3	8	1	5
20	Acute bronchitis	9	.....	1	.....	.....	.....	3	.....	.....	.....	.....	.....
21	Chronic bronchitis	8	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	1
22	Pneumonia (except broncho-pneumonia).	72	2	3	1	.....	3	4	1	2	6	1	2
22a	Broncho-pneumonia	31	1	5	.....	2	.....	10	.....	.....	.....	.....	1
23	Other respiratory diseases	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	.....
24	Diseases of the stomach (cancer excepted).	7	3	.....	.....	.....	.....	.....	.....	.....	.....	2	1
25	Diarrhea and enteritis (under two years).	34	.....	5	2	1	1	2	.....	.....	.....	.....	1
26	Appendicitis and typhlitis	5	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....
27	Hernia, intestinal obstruction,	9	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
28	Cirrhosis of liver	9	.....	.....	.....	1	.....	.....	.....	1	1	1	1
29	Bright's disease and nephritis	61	6	3	.....	2	2	1	1	1	3	3	2
30	Diseases of women (not cancer),	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	4	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....
32	Other puerperal diseases	6	.....	.....	2	.....	.....	1	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	41	2	2	4	1	1	2	3	.....	1	.....	2
34	Old age	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	54	5	1	1	3	2	2	3	4	1	.....	.....
36	Suicide	13	.....	.....	.....	.....	1	1	.....	.....	.....	.....	1
37	Other diseases	152	6	1	4	2	2	5	3	9	6	5	2
38	Ill defined causes	6	1	1	.....	.....	.....	.....	.....	.....	.....	.....	1
	Total deaths under one year	146	5	11	8	3	2	16	4	2	1	.....	5

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
22	31	31	28	32	39	31	35	61	27	37	25	37	32	17	2	112	5	....
10.52	17.53	15.56	15.76	14.27	17.34	16.39	12.97	11.99	10.18	14.54	9.34	11.12	13.57	12.97	....	....	....	....
11.72	13.56	12.20	11.92	10.55	14.00	14.35	8.28	9.88	14.69	10.77	12.28	12.09	9.65	.....	....	....	....	....
1	.....	1	.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....	.....	....	....	...	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	4
1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	6
.....	.....	2	.....	.....	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	7
.....	.....	.....	.....	.....	.....	.....	.....	2	.....	.....	.....	.....	2	.....	....	....	...	8
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	9
1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	12
1	2	6	2	1	5	5	9	4	1	4	6	3	2	.....	....	4	1	13
1	.....	.....	.....	1	.....	.....	1	1	.....	.....	1	.....	2	.....	....	1	...	14
.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	15
2	2	3	1	3	2	3	2	4	3	3	1	7	5	2	....	13	...	16
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	....	....	...	17
.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	....	....	...	17a
2	2	.....	4	5	2	.....	1	4	3	4	4	5	2	1	....	3	...	18
2	4	4	1	7	5	5	5	6	7	10	1	5	8	2	....	15	...	19
.....	.....	1	.....	.....	1	.....	1	.....	1	.....	.....	.....	1	.....	....	....	...	20
1	.....	.....	.....	.....	1	.....	.....	2	1	1	.....	.....	.....	.....	....	....	...	21
2	11	2	3	2	2	5	3	7	2	3	.....	1	.....	1	1	2	...	22
.....	.....	1	.....	2	.....	1	1	2	1	.....	.....	.....	.....	.....	....	4	...	22a
.....	.....	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	23
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	24
.....	1	1	2	1	6	.....	.....	2	1	.....	2	.....	.....	.....	....	3	3	25
.....	.....	.....	1	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	1	....	1	...	26
.....	1	.....	.....	.....	.....	.....	.....	2	.....	1	1	.....	.....	1	....	3	...	27
1	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	....	....	...	28
.....	1	.....	3	2	3	2	2	5	1	2	4	3	1	3	....	5	...	29
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	2	...	30
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	.....	1	....	....	...	31
.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	2	...	32
.....	.....	.....	1	3	2	.....	1	5	.....	1	1	3	2	.....	....	4	...	33
.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	1	.....	....	....	...	34
1	1	1	3	1	1	1	1	1	3	2	1	.....	1	1	1	12	...	35
2	.....	.....	.....	1	.....	.....	.....	1	1	.....	1	.....	.....	.....	....	4	...	36
4	4	6	3	2	8	5	7	10	2	6	2	8	2	4	....	33	1	37
.....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	....	....	...	38
2	4	5	5	6	9	5	3	9	3	2	3	5	7	2	....	16	3	

VITAL STATISTICS.

November Infant Mortality.

Detailed List Class Number.	Causes of Death.	November Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	146	139	15	10	5	12	6	9	2	14	12	29	17	15	30	68	16
	Male	85	76	10	7	2	8	3	7	2	11	4	21	7	3	16	39	89
	Female	61	63	5	3	3	4	3	2	...	3	8	8	10	12	14	29	7
	White	143	132	15	10	5	11	6	9	2	14	12	29	15	15	29	67	16
	Colored	3	7	...	...	...	1	...	...	...	...	...	...	2	...	1	1	...
1	Typhoid fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
5	Smallpox	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
6	Measles	1	3	...	...	...	...	...	...	...	...	...	...	...	1	.....	1	...
7	Scarlet fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
8	Whooping cough	2	3	...	...	...	...	...	...	...	...	...	1	...	1	.....	2	...
9	Diphtheria and croup	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
10	Influenza	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
14	Dysentery	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
18	Erysipelas	1	.....	...	...	...	...	...	...	...	...	...	1	...	...	1	.....	...
19	Other epidemic diseases	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
20	Pus-infection and septicemia,	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
24	Tetanus	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
28	Tuberculosis of the lungs	1	.....	1	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
29	Acute miliary tuberculosis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
30	Tuberculous meningitis	3	.....	...	...	...	...	...	...	...	...	...	...	1	2	1	2	...
31 35	Other forms of tuberculosis	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
36	Rickets	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
37	Syphilis	4	5	...	...	...	...	...	1	...	...	2	1	...	...	.....	4	1
38	Gonococcus infection	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
61	Simple meningitis	1	.....	...	...	...	...	...	...	...	...	...	1	...	...	1	.....	...
61a	Cerebro-spinal fever	1	1	...	...	...	...	...	...	...	...	...	1	...	...	1	.....	...
63a	Acute poliomyelitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
71	Convulsions	1	2	...	...	1	...	...	...	...	...	...	...	...	...	.....	.....	...
76	Diseases of the ears	2	1	...	...	...	...	...	...	...	...	...	1	1	...	.....	2	1
79	Organic diseases of the heart,	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
89	Acute bronchitis	4	6	...	...	...	...	...	2	...	2	...	...	...	...	3	1	...
91	Broncho-pneumonia	14	15	...	...	...	1	...	1	...	2	1	3	2	4	4	9	3
92	Pneumonia	11	8	...	...	...	1	2	1	...	...	...	4	1	2	3	5	1
93	Pleurisy	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
103	Other diseases of stomach	2	1	...	...	1	...	...	...	...	...	...	...	1	...	.....	1	...

November Infant Mortality.— *Concluded.*

Detailed List Class Number.	Causes of Death.	November Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
104	Diarrhea and enteritis	32	20	...	...	...	...	...	2	1	4	5	11	6	3	7	25	3
108	Appendicitis and typhlitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
109	Hernias, intestinal obstruction,	1	2	...	...	...	...	...	...	...	...	...	...	1	...	1	...	...
117	Simple peritonitis	1	...	...	...	...	...	...	...	...	...	...	...	1	...	...	1	...
119	Acute nephritis	2	...	...	...	...	...	...	...	...	1	...	...	...	1	1	1	...
143	Furuncle	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
144	Acute abscess	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
145	Other diseases of skin, etc.	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
150*a*	Hydrocephalus	2	...	1	...	...	...	...	...	...	1	...	...	...	...	...	1	...
b	Congenital malformations of heart.	8	12	...	1	1	1	1	1	...	...	2	...	1	...	1	3	...
c	Other malformations	1	...	...	...	...	...	...	...	...	1	...	...	...	...	1	...	...
151*a*	Premature birth	19	...	7	6	1	4	...	1	...	...	...	...	...	...	1	...	1
b	Congenital debility	11	34	1	...	...	...	1	...	1	1	1	4	1	1	1	8	3
152*a*	Injuries at birth	9	...	5	2	...	1	1	...	...	...	...	...	...	...	...	...	1
b	Other causes peculiar to early infancy.	5	13	...	...	1	3	1	...	...	...	...	...	...	...	...	...	2
167	Burns (conflagrations excepted).	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
168	Absorption of deleterious gases,	1	...	...	...	...	...	...	...	...	...	1	...	...	...	1	...	...
172	Traumatism by fall	...	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
182, 184	Homicide	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
187, 189	Ill-defined diseases	3	5	...	1	...	...	...	...	...	2	...	...	...	...	1	1	...
	Other causes	3	5	...	...	...	1	...	...	...	...	...	1	1	...	1	1	...
	Breast fed *	30	24	...	...	...	...	...	7	1	6	2	5	4	5	30	...	...
	Bottle fed *	68	62	...	...	...	...	...	2	1	8	10	24	13	10	...	68	12
	Nonresidents	16	12	...	...	...	2	2	...	...	1	2	7	2	...	...	12	16

* Aged two weeks and over.

Additional Deaths for Other Months.

Sept., 1912.— 1 female; cerebral hemorrhage; white; aged 37 years; married; residence Ward 12; born in United States; birthplace of mother unknown.

1 male; diarrhea and enteritis; white; age 1 year; single; nonresident; born in United States; mother born in United States.

Oct,. 1912.— 1 female; starvation; white; aged 83 years; single; residence Ward 19; born in United States; birthplace of mother unknown.

1 male; pneumonia; white; aged 43 years; widower; residence Ward 7; born in Scandinavia; mother born in Scandinavia.

1 male; fracture (cause not specified); white; aged 45 years; condition unknown; residence unknown; birthplace unknown; birthplace of mother unknown.

1 female; homicide by other means; white; aged 60 years; widow; residence Ward 9; born in Ireland; birthplace of mother unknown.

1 male; organic heart disease; white; aged 44 years; single; residence Ward 9; born in Ireland; mother born in Ireland.

DIVISION OF COMMUNICABLE DISEASES, NOVEMBER, 1912.

Medical Inspectors.

New cases visited:	
Diphtheria:	
a. Isolation	96
b. Diagnosis	5
Scarlet fever:	
a. Isolation	66
b. Diagnosis	12
c. Release	28
Typhoid fever	12
Measles:	
a. Isolation	7
b. Diagnosis	4
Varicella:	
a. Isolation	1
b. Diagnosis	11
Epidemic cerebro-spinal meningitis	2
Ophthalmia neonatorum	10
Tuberculosis	72
Variola	1
Deaths investigated	14
Vaccinations performed	785
Certificates granted	26

Nurses.

New cases visited:	
Diphtheria	143
Scarlet fever	94
Typhoid fever	25
Poliomyelitis	2
Whooping cough	68
Ophthalmia neonatorum	87
Mumps	37
Measles	331
Varicella	108
Malaria	0
Cerebro-spinal meningitis	3
Trachoma	2

Old cases visited:	
Diphtheria	169
Scarlet fever	248
Typhoid fever	75
Poliomyelitis	0
Whooping cough	61
Ophthalmia neonatorum	191
Mumps	24
Measles	448
Varicella	107
Cerebro-spinal meningitis	0
Release cultures taken for diphtheria	87

Forcible Removals.

Tuberculosis	2
Specific disease	1
Diphtheria	0
Scarlet fever	1

Disinfections.

Diphtheria	143
Scarlet fever	99
Tuberculosis	156
Infected bedding, etc.	3 lots
Infected books, etc.	5 lots
Infected clothing, etc.	9 lots
Infected carriages	3

November, 1912. Cases Reported.

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum.
1	....	....	....	....	....	10	....	....	....	....	1	1	4
2	1	....	....	....	....	6	....	....	....	....	7	6	4
3	....	....	....	....	....	4	....	....	....	....	.....	....	4
4	....	....	....	....	....	4	....	....	....	....	.....	....	....
5	....	....	....	....	....	.....	....	....	....	....	1	1	2
6	....	....	....	....	....	12	....	....	1	....	36	16	6
7	....	....	....	....	....	3	....	....	....	....	38	....	4
8	....	....	....	....	....	15	....	....	....	....	19	1	13
9	....	....	....	....	....	2	....	....	....	....	43	1	8
10	....	....	....	....	....	4	....	....	....	....	15	....	1
11	....	....	....	....	....	2	....	....	....	....	3	3	2
12	....	....	....	....	....	20	....	....	....	....	18	....	5
13	....	....	....	....	....	4	....	....	....	....	.....	3	11
14	....	....	....	....	....	.....	....	....	....	....	18	....	3
15	....	....	....	....	....	4	....	....	....	....	17	2	2
16	....	....	....	....	1	2	....	....	....	....	1	....	1
17	....	....	....	....	....	6	....	....	....	....	14	....	2
18	....	....	....	....	....	3	....	....	....	....	36	....	1
19	1	....	....	....	....	5	....	....	....	....	18	....	....
20	....	....	....	....	....	18	....	....	....	....	28	2	3
21	1	....	....	....	....	5	....	....	....	....	5	3	2
22	....	....	....	....	....	5	....	....	....	....	11	1	5
23	....	....	....	....	....	3	....	....	....	....	3	1	2
24	....	....	....	....	....	4	....	....	....	....	46	....	3
25	....	....	....	....	....	6	....	....	....	....	3	....	1
26	....	....	....	....	....	7	....	....	....	....	.....	....	1
Total	3	....	....	....	1	154	....	....	1	....	381	41	90
Unknown	....	....	....	....	....	.....	....	....	....	....	.....	....	....
Nonresidents	....	....	....	....	....	14	....	....	....	....	3	....	6
Grand total	3	....	....	....	1	168	....	....	1	....	384	41	96
Corresponding month last year	3	....	....	....	5	180	....	....	....	....	119	11	84

COMMUNICABLE DISEASES.

Cases Reported. **November, 1912.**

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
9	....	....	....	....	5	1	1	....	3	2	....	1
3	....	....	....	....	9	....	3	....	1	6	....	2
3	....	....	....	....	2	....	....	....	.....	.....	....	3
11	....	....	....	....	3	....	2	....	4	1	....	4
4	....	....	....	....	6	....	....	....	2	.....	....	5
2	....	....	1	....	11	2	3	....	7	7	....	6
1	....	....	....	....	14	1	3	....	.....	.....	....	7
2	....	....	1	....	20	4	1	....	6	2	....	8
3	....	....	....	....	14	....	4	....	8	3	....	9
1	....	....	....	....	12	1	1	....	.....	1	....	10
3	....	....	....	....	5	1	....	....	2	1	....	11
8	....	....	....	....	12	1	....	....	2	6	....	12
2	1	....	....	....	16	1	....	....	.....	9	....	13
3	....	....	....	....	14	1	1	....	6	26	....	14
3	....	....	....	....	6	1	1	....	6	12	....	15
4	....	....	....	....	12	1	....	....	7	6	....	16
2	....	....	1	....	8	....	1	....	3	14	....	17
1	....	....	....	....	11	....	1	....	2	3	....	18
.....	....	....	....	....	19	1	....	....	4	2	....	19
13	....	....	....	....	14	1	5	....	15	1	....	20
2	....	....	....	....	17	....	1	....	8	4	....	21
5	....	....	....	....	8	....	....	....	3	1	....	22
16	....	....	....	....	5	1	1	....	16	2	....	23
5	....	....	....	....	5	....	....	....	17	5	....	24
4	....	....	....	....	2	....	1	....	3	4	....	25
1	....	....	....	....	2	....	....	....	.....	.....	....	26
111	1	....	3	....	252	18	30	....	125	118	....	Total
.....	....	....	....	....	.....	1	....	....	.....	.....	....	Unknown
13	....	....	2	....	9	3	....	....	.....	.....	....	Nonresidents
124	1	....	5	....	261	22	30	....	125	118	....	Grand total
103	2	....	2	....	205	61	61	....	108	55	....	Corresponding month last year.

1. Medical Inspection of Schools.

Number inspections made	15,698
Number physical examinations made	19,798
Number visits made to homes	191

There were 2,950 pupils excluded from schools during this month ill with contagious diseases, as follows:

Diphtheria	4	Gonorrhea	1
Scarlet fever	8	Pediculosis	1,515
Measles	13	Acute or purulent conjunctivitis	35
Chicken pox	46	Ringworm	28
Whooping cough	11	Scabies	4
Mumps	11	Impetigo	107
Pulmonary tuberculosis	1	Erysipelas	2
Acute tonsillitis	111	Miscellaneous	1,050
Influenza	3		

There were 23,742 cases of noncontagious disease found, subdivided as follows:

Diseases of oral and respiratory tract	5,696
Diseases of ear	108
Diseases of eye	579
Diseases of skin	1,289
Dental caries	8,042
Miscellaneous diseases	8,028

2. Physical Examination of Licensed Minors.

There were 358 children between the ages of 14 and 16 years of age examined during the month. One hundred and seven were found to be without defects and 251 with defects as follows:

Hearing	1	Cervical glands	26
Eyesight	51	Pulmonary disease	6
Mental deficiency	1	Cardiac disease	7
Defective nasal breathing	6	Orthopedic defects	22
Hypertrophied tonsils	15	Rickets	1
Defective teeth	160	Malnutrition	1
Defective palate	1	Miscellaneous	46

3. Pre-Natal and Post-Natal Work.

Pre-Natal.

Number cases	75	Number babies born	12
Number visits	95	Number babies breast fed	12

The following defective conditions were noted:

Varicose veins	4	Miscarriage	1
Oedema	2		

Mothers attended as follows:

Family physician	8	Midwife	2
Hospital	2		

Post-Natal.

Number cases	1,256	Bottle-fed babies	153
Number visits	3,734	Both feedings	94
Breast-fed babies	1,009		

Defective Conditions Noted.

Otitis media	4	Cervical glands	3
Improper feeding	68	Cervical abscess	2
Ophthalmia	15	Orthopedic defects	6
Skin	10	Umbilical hernia	1

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:		
Positive for diagnosis	95	
Positive for release	32	
Negative for diagnosis	874	
Negative for release	219	
"No growth" cultures	13	1,233
TUBERCULOSIS:		
Positive	92	
Negative	316	
Unsatisfactory	1	409
TYPHOID:		
Positive	19	
Atypical	7	
Negative	115	
Unsatisfactory	1	142

GLANDERS:	Strauss.	C. F.	Ag.	
Positive	1	25	21	47
Negative	0	86	90	176
Unsatisfactory	0	0	0	0
Atypical	0	9	8	17—240

GONORRHEA:		
Positive	39	
Negative	136	
Unsatisfactory	1	176
GONORRHEAL OPHTHALMIA:		
Positive	0	
Negative	27	
Unsatisfactory	0	27
*OTHER EXAMINATIONS:		
Positive	8	
Negative	39	
Unsatisfactory	0	47
BACTERIOLOGICAL MILK EXAMINATIONS	520	520
Bacteriological ice cream examinations	28	28
Total	2,822	2,822

SPECIAL WORK:

Longevity of tubercle bacilli in cow feces.

Testing the toxicity of washings from the mouths of diphtheria patients.

* K-L Vir. smear for T. B., organisms, typhoid conradi, malaria, G-U. T. B., paratyphoid, syphilis, B. coli.

INSPECTION OF MILK, VINEGAR, ETC.

Examination as to Statute Requirements.

Samples examined, milk from stores	575
" " milk from wagons	667
" " milk brought in by citizens	37
" " milk for bacteriological examination	520
" " ice cream	28
" " vinegar	105
" " butter and cheese	23
Total samples	1,955

INSPECTION OF DAIRIES.

Satisfactory * on first inspection	223	
Satisfactory on later inspection	327	
		550
Unsatisfactory on first inspection	82	
Unsatisfactory on later inspection	54	
		136
Total number of inspections		686
Dairies having milk rooms	378	
Dairies without milk rooms	308	
Number of cattle inspected	7,983	
Number of dairies prohibited shipping milk to Boston	41	

* "Satisfactory" means having a score of at least 45 per cent. by the government score card.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	811	Cattle condemned (3 and parts),	2,700 lbs.
Calves inspected	362	Calves condemned (parts)	2 lbs.
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	7,570	Swine condemned (11 and parts),	4,319 lbs.

INSPECTION OF PROVISIONS.—ARTICLES CONDEMNED.

Meats.		Miscellaneous.	
Mutton (tainted)	30 lbs.	Canned goods (tainted)	35 cans.
Beef (tainted)	33 lbs.	Fruit (decayed)	1 bush.
Pork (tainted)	383 lbs.	Vegetables (decayed)	1½ bush.
Poultry (tainted)	6,662 lbs.	Figs (decayed)	12 lbs.

SANITARY INSPECTION DIVISION.

New reports	2,693
Reinspections	9,292
New tenement house reports	585
Nuisances reported	4,283
Legal notices	366
Court cases	8
Fines	$73
Tenements vacated	4
Milk applications approved	135
Stable permits granted	2
Stable permits withheld	2
Stable hearings	4
Dump permits refused	1

QUARANTINE.

Vessels inspected at quarantine	38
Total immigrants arriving in Boston	4,177

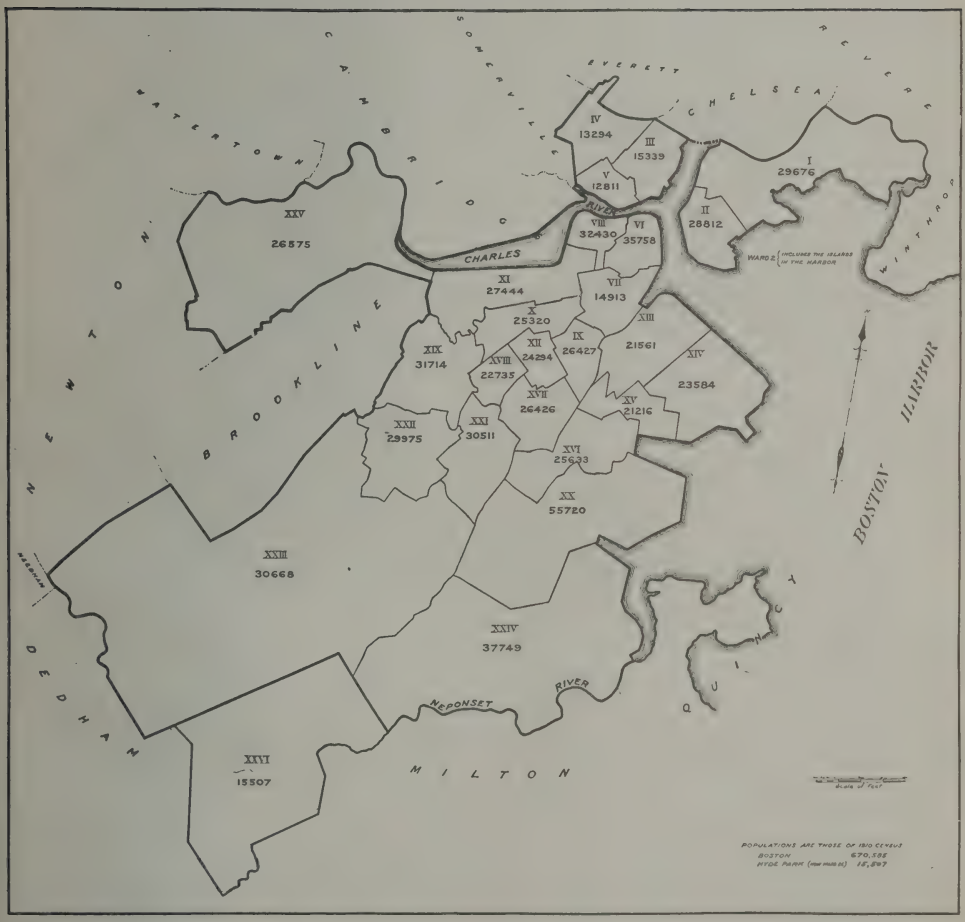
MONTHLY METEOROLOGICAL SUMMARY.

Taken at Weather Bureau, Boston, November, 1912.

Day.	Temperature, Degrees Fahrenheit.			Relative Humidity.	Daily Precipitation.	Actual Hours Sunshine.	Wind.		
	Maximum.	Minimum.	Mean.				Average Hourly Velocity. (Miles.)	Maximum Velocity. (Miles.)	Prevailing Direction.
1.....	65	44	54	85	.62	0.9	13.1	28	S.
2.....	52	33	42	60	0	7.8	13.2	24	N. W.
3.....	39	30	34	54	0	10.2	10.2	20	N. W.
4.....	53	29	41	57	0	10.2	11.2	19	S. W.
5.....	65	47	56	66	0	10.1	10.5	20	S. W.
6.....	69	50	60	76	0	7.6	12.5	26	S. W.
7.....	70	60	65	92	.76	0.6	16.6	38	S.
8.....	67	43	55	70	.30	7.9	14.7	32	W.
9.....	54	40	47	60	T	4.1	9.8	20	W.
10.....	48	35	42	48	0	10.0	9.8	22	N. W
11.....	62	40	51	72	0	8.9	6.3	14	S. W.
12.....	70	48	59	68	0	6.4	9.8	16	W.
13.....	52	44	48	93	.08	0	16.1	25	E.
14.....	47	38	42	93	.41	0	9.9	24	N., N. E.
15.....	51	36	44	74	0	5.5	11.3	19	N. W.
16.....	40	33	36	65	0	9.8	13.9	26	N. W.
17.....	43	30	36	69	0	0.4	8.8	14	W.
18.....	39	31	35	76	0	3.0	13.2	23	N. W.
19.....	47	26	36	70	0	8.8	9.5	15	W.
20.....	58	40	49	56	0	9.5	10.0	16	W.
21.....	68	45	56	54	0	7.6	10.5	19	S. W.
22.....	62	51	56	56	0	0.5	7.5	13	S. W.
23.....	52	42	47	72	0	9.6	8.4	13	E.
24.....	50	39	44	88	.42	0	21.3	43	E.
25.....	45	36	40	74	T	0.3	16.6	30	S. W.
26.....	47	38	42	62	0	5.2	10.6	16	W.
27.....	48	36	42	57	0	7.7	10.9	22	W.
28.....	38	26	32	72	.02	0	13.1	32	N.
29.....	42	24	33	66	0	8.0	12.2	18	S. W.
30.....	48	35	42	52	0	9.2	14.6	33	W.
31.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
Totals.....	—	—	—	—	2.61	169.8	—	—	—
Means.....	53.0	38.3	45.5	68.6	.....	5.7	11.8	.....	W.

Latitude 42 degrees 21 minutes. Longitude 71 degrees 4 minutes.

BOSTON WARD MAP.



Vol. I. DECEMBER, 1912 No. 12

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT

OF THE

CITY OF BOSTON

	Page
Food Inspection,	303
Vital Statistics, December, 1912	310
Monthly reports	321
Provisional Summary of Vital Statistics, 1912	331
Table of Contents, Vol. I., Monthly Bulletin	339

CITY OF BOSTON
PRINTING DEPARTMENT
1913

ORGANIZATION OF THE HEALTH DEPARTMENT

FRANCIS X. MAHONEY, M. D., *Chairman.*
P. H. MULLOWNEY, M. D. V.

F. H. SLACK, M. D., *Secretary.*

ALLIED PRINTING TRADES UNION LABEL COUNCIL BOSTON MASS.

MONTHLY BULLETIN

OF THE

HEALTH DEPARTMENT OF THE CITY OF BOSTON.

All communications relating to this publication should be addressed to
BULLETIN OF THE HEALTH DEPARTMENT, 100 Summer St., Boston.

VOL. 1. BOSTON, DECEMBER, 1912. No. 12.

FOOD INSPECTION.

BY ALEXANDER BURR, M. D. V.

Chief of Division of Food Inspection, Boston Health Department.

There is at present so much consideration being given to the subject of "Pure Foods" throughout the country, much of which is sensational and technical, and the prevailing erroneous idea that the local boards of health in this state have the enforcement of all laws bearing on this subject, that it would seem well at this time to define the difference between the so-called pure food laws, a term which is of comparatively recent origin, and the old established law prohibiting the sale of food articles when unfit for food because of disease, decay, decomposition or unwholesomeness. The scope of the latter is seen in the following sections of chapter 56 of the Revised Laws:

SECTION 70. Boards of health of cities and towns may inspect the carcasses of all slaughtered animals and all meat, fish, vegetables, produce, fruit or provisions of any kind found in their cities or towns, and for such purpose may enter any building, enclosure or other place in which such carcasses or articles are stored, kept or exposed for sale. If, on such inspection, it is found that such carcasses or articles are tainted, diseased, corrupted, decayed, unwholesome or, from any cause, unfit for food, the board of health shall seize the same and cause it or them to be destroyed forthwith or disposed of otherwise than for food. All money received by the board of health for property disposed of as aforesaid shall, after deducting the expense of said seizure, be paid to the owner of such property. If the board of health seizes or condemns any such carcass or meat for the reason that it is affected with a contagious disease, it shall immediately give notice to the board of cattle commissioners of the name of the owner or person in whose possession it was found, the nature of the disease and the disposition made of said meat or carcass.

SECT. 71. The board of health may inspect all veal found, offered or exposed for sale or kept with the intent to sell in its city or town and if, in its opinion, said veal is that of a calf less than four weeks old when

killed, the board shall seize and destroy or dispose of it as provided in the preceding section, subject, however, to the provisions thereof relative to the disposal of money.

SECT. 72. Whoever prevents, obstructs or interferes with the board of health in the performance of its duties as provided herein, or hinders, obstructs or interferes with any inspection or examination by it, or whoever secretes or removes any carcass, meat, fish, vegetables, fruit or provisions of any kind, for the purpose of preventing the same from being inspected or examined under the provisions of sections seventy to seventy-six, inclusive, shall be punished by a fine of not more than one hundred dollars or by imprisonment for not more than sixty days, or by both such fine and imprisonment.

SECT. 73. Whoever knowingly sells, offers or exposes for sale or has in his possession with intent to sell for food any diseased animal or any product thereof, or any tainted, diseased, corrupted, decayed or unwholesome carcass, meat, fish, vegetables, produce, fruit or provisions of any kind shall be punished by a fine of not more than one hundred dollars or by imprisonment for not more than sixty days, or by both such fine and imprisonment; and whoever knowingly sells any kind of diseased, corrupted or unwholesome provisions, whether for meat or drink, without making their condition fully known to the buyer shall be punished by a fine of not more than two hundred dollars or by imprisonment for not more than six months.

SECT. 74. Whoever kills or causes to be killed or knowingly sells, offers or exposes for sale or has in his possession with intent to sell for food the veal of a calf killed when less than four weeks old shall be punished by a fine of not more than one hundred dollars or by imprisonment for not more than sixty days, or by both such fine and imprisonment.

SECT. 75. The board of health for the city or town in which any animal or property has been condemned under the provisions of sections seventy and seventy-one may cause a description of the place in which such condemned property was found, the name of every person in whose possession it was found and the name of every person convicted of an offence under the provisions of the two preceding sections to be published in two newspapers published in the county in which such property was found.

SECT. 76. Whoever knowingly sells or exposes for sale poultry, unless it is alive, before it has been properly dressed by the removal of the crop and entrails if they contain food, shall be punished by a fine of not less than five nor more than fifty dollars for each offence. Boards of health shall cause the provisions of this section to be enforced in their respective cities and towns.

The enforcement of these sections is in the hands of the local boards of health, and calls for a thorough inspection of all articles of food offered for sale.

The so-called pure food laws refer rather to the law which prohibits fraud, adulteration, substitution or misbranding, in order to aid in the sale of inferior substances for the pure article. The chief statute relating to this class of foods is chapter 75, section 18, of the Revised Laws. The enforcement

of this section is wholly in the hands of the State Board of Health, the local boards having no more authority to inspect or prosecute than any citizen might have. From even a superficial study of the law in regard to adulterated foods it is readily seen that there may be many violations of it, none of which would be a violation of the law chapter 56, section 73, Revised Laws above quoted.

Criticism is frequently made of the failure of local boards of health to enforce the laws in regard to adulteration, more popularly known as the "Pure Food Laws," but as has been stated before, the authority to enforce these laws is vested in the State Board of Health. Should local boards of health attempt independently of the State Board to enforce these laws, it would result in conflict of authority, and confusion.

The Board of Health in the enforcement of the food laws is called upon to act with judgment, for its duty should be the conservation of food articles as well as the condemnation of articles unfit for human food. In these times of high cost of living all articles fit for food should be saved, and the reason for such a suggestion is readily seen at certain times of the year when there is a large destruction of valuable food articles in consignments from the south and west. During the last Christmas week, when many large consignments of poultry were received, only 75 pounds of poultry were condemned, and not a complaint from consumers, to indicate the purchase or sale of any tainted article.

There is too much condemnation of valuable foods based on too technical arbitrary standards, and sentimental reasons. Take, for instance, the rules and regulations in force all over the country, for the condemnation of slaughtered animals infected with tuberculosis. Many fine cattle and swine, infected with this disease in the internal organs, are condemned as unfit for food, the carcass consigned to the grease tank; when it is recognized and admitted to-day, by the leading scientists, that meat in contradistinction to milk, is not a source of transmission of tuberculosis from animal to man. The contrast between the thorough rigid examination of tuberculous animals at the time of slaughter, resulting in the exclusion from consumption of generalized cases, even though the meat was cooked and as above stated not recognized as a source of transmission of disease to man, and the absence of any inspection of swine for the detection of trichinosis, relying entirely upon the cooking of the meat to prevent its spread to man is interesting and should serve as a reason for thorough con-

sideration of our present standards. A law was passed in this state in 1908 calling for the condemnation of the meat of animals killed when not in health. A certain newspaper commented on the enforcement of this law, with the result that the interpretation rendered by the attorney-general and its enforcement resulted in a farcical wholesale condemnation of the choicest of meats, and if it had been logically carried out would have required the condemnation of the finest animal if it had had a sore eye.

The adoption of hard and fast technical and arbitrary standards by local state and national departments, without the authority to make the same, should be avoided. So far as Massachusetts is concerned, this authority is very much more limited than previously thought.

There is a growing tendency, of late, in all large cities, for private associations to interest themselves in public health questions. Many of these associations are doing good work and are undoubtedly the instigators of many improvements among the food stores.

There is occasionally a feeling among these associations that the work of boards of health is not satisfactory, but it should be remembered that the work of boards of health is limited strictly to the law, which is the conserving of the health of a community. Their work is restricted by legislation and they cannot get beyond it.

In many cases which have been tried before the courts because of violation of regulations, the defendant has been discharged because the regulations were beyond the scope of authority of the Board of Health to make. Take, for instance, the exposure of food regulations of 1911, passed by the Board of Health of Boston, when in the enforcement of same, the defendants were discharged, because the regulation was beyond the authority of the Board of Health to make. Even the law of 1912 giving the local boards of health authority to make regulations in regard to the exposure of food articles, with the additional approval of the State Board of Health, expressly limits the regulation to one which prevents "injury to the public health."

Sentiment is becoming an exceedingly great influence in the question of rules for food inspection. Certain conclusions are arrived at, they are discussed, and at each discussion receive added enthusiasm and momentum, and are ready to be absorbed by the general public, who accept such conclusions believing them to be sufficient reasons for their adoption as

regulations. Boards of health, whose work is the enforcement of legislative acts, in these times of limited appropriations and authority, should confine their work to such matters as really affect the public health, leaving the sentimental and aesthetic side of food questions to others.

In these days when sentiment and technical standards are so prominent, food concerns and dealers, to protect themselves, attack in court regulations which they would comply with if such regulations were wisely rather than technically enforced. The attitude of the recently appointed Chief of the United States Bureau of Chemistry, Dr. Alsberg, in a late newspaper interview, where he says, "We must know that if we say 'thou shalt not' to drug or food producers, that we are standing on such grounds that we cannot be mistaken, and we must not be reversed when the matter gets into court," is to be commended.

It is not the desire of the writer to adversely criticise the work of any association, but rather to show that the Board of Health, with its limited authority as defined by law, cannot take up the many suggestions of these associations.

Much comment is made on the use of damaged food articles, and many well-meaning authorities are opposed to the use of them for food. It is interesting to hear the different opinions among the various dealers in foods on this question. Certain dealers think that the use of good matured veal, weighing only 40 pounds when dressed is unfit for food because their trade has been in much heavier weight. Some dealers in eggs do not believe in the sale of any so-called spotted eggs, even though satisfactory for food, because it is argued that the destruction of such eggs would increase the sale of the better kind.

A recent statement that "there are sufficient No. 1 food articles for the entire public" is not generally accepted as a fact. At this time, it would seem well to consider the so-called "rots and spots" in the egg business. "Rots and spots" is a term used in the wholesale egg trade to indicate the eggs discarded by the several wholesale dealers as not suitable for their particular trade, and the character of "rots and spots" varies with the class of trade of the dealer. It is a term that should not be used collectively, for it is misleading and often used by food authorities to give the impression that all are unfit for food. Such is not the case, for all "rots" are not "spots" and "spots" are rarely "rots." Many of the best storage and new laid eggs find their way into the classification of "rots and spots," not being merchantable because cracked, and certainly are suitable for food when properly handled.

When it is considered that probably 90 per cent of all perishable food articles consumed in New England are produced from 1,000 to 3,000 miles away, it will be seen that many of such articles must arrive in damaged condition, and if all were destroyed there must certainly be a large waste of valuable food articles, and the question of whether they should be condemned or not by the health authorities should not be based upon the price or demand.

All large cities which are the receiving centers for food articles from long distances and also the distributing centers for large sections, must have a considerable amount of food arriving in damaged condition, also food which on account of lack of demand has become damaged by age. Such goods while being salable direct to certain consumers who would properly care for them are not suitable to put directly in the hands of the great consumers, but should go to licensed handlers of such articles who will properly prepare them for consumption.

Reference in this connection is made to the rehandling of vegetables, fruits, figs, nuts, raisins, prunes, eggs and many other valuable articles of food, all of which if properly supervised when rehandled, can reach the consumer in good condition, and must have an appreciable effect on the high cost of living question. There are many stores in all large cities that handle such goods, and the retail price is such that many families are able to enjoy substantial delicacies that they could not if no such stores existed and they were compelled to buy only the first grade.

The following law was enacted in 1907, permitting the sale in the original package of damaged fruit and vegetables if the contents were made known:

CHAPTER 293, ACTS OF 1907.

SECTION 1. The provisions of section seventy-three of chapter fifty-six of the Revised Laws shall not apply to persons, firms or corporations engaged in the wholesale fruit and vegetable business, who, at the time of sale of fruit or vegetables in the original package, make known to the purchaser the partly decayed condition of the articles in said packages.

There is a large amount of damaged food articles and also of articles of slightly inferior grades from which that suitable for food could be separated, but this should be performed under the supervision of boards of health. A bill has been introduced into the present session of the Legislature which calls for the licensing of all places where food articles are resorted, rehandled, repacked, etc., and also giving the Board of

Health authority to make rules governing the sanitary handling of the same. The law in regard to food articles mentioned in the first part of this paper does not permit the condemnation of any good foodstuffs, but anyone with experience with food inspection knows that there are times when plenty of food articles which are not suitable to sell direct to the consumer because some are unfit, and also certain articles which are not salable for table use in their present condition, when properly separated and prepared under supervision in such licensed places as proposed are again put in perfectly satisfactory condition for food.

In conclusion it is to be hoped that this article will be received as an attempt to encourage the conservation of foodstuffs, and not in any way intended to encourage or legalize the offering to the consumer of the slightest amount of food unfit for human consumption, but rather for their protection.

SUMMARY OF VITAL STATISTICS FOR THE MONTH OF DECEMBER, 1912.

Boston had 996 deaths in December, compared with 935 for December of last year; and a death rate of 16.29 against 15.98 for December, 1911.

Of deaths from reportable diseases, compared with December, 1911, the principal decrease was tuberculosis of the lungs, 8. The principal increases were measles, 27; scarlet fever, 6; other forms of tuberculosis, 5, and whooping cough, 4.

Other important differences were as follows:

December, 1912, decreases compared with December, 1911:

"Other diseases"	34
Suicide	9
Apoplexy	4

December, 1912, increases compared with December, 1911:

Pneumonia and broncho-pneumonia	28
Organic heart disease, Bright's disease and nephritis	16
Bronchitis	12
Cancer	10
Violent deaths	9
Appendicitis	4

Ward 1 had the lowest rate, 9.69, and Ward 7 the highest, 22.55.

Deaths of nonresidents were 127 against 95 in December, 1911.

There were 20 more deaths under 1 year than in December, 1911, 51 more under 5 years, and 15 more over 60 years.

Total deaths under 1 year were 158, which is exactly the average number for December for the preceding five years. Sixty-eight of these deaths were due to premature birth, congenital debility, malformations and other diseases peculiar to early infancy; 27 to pneumonia and broncho-pneumonia; 25 to reportable diseases; 15 to diarrhea and enteritis; and 23 to other causes.

Of these deaths under 1 year, Ward 6 had the largest number, 11, and Ward 9 came next with 10. One hundred and nine were over 2 weeks old and of these 81 were bottle fed.

One hundred and seventy-one cases of diphtheria were reported against 227 in December, 1911, and 20 cases of typhoid fever against 30 last year. On the other hand there were 677 cases of measles against 287 in December, 1911; 199 cases of scarlet fever against 117 last year; 263 cases of tuberculosis of the lungs against 231 last year; and 121 cases of whooping cough against 86 last year.

GENERAL STATISTICS.

Population, Ward Area, Persons to Acre, and Rates.

	Land Area in Acres.	Population, 1910 Census.	Persons to Acre of Land.	Population, Estimated, July 1, 1912.†	Death Rates, 1911. (Population, Estimated.)†	Birth Rates, 1910. (Population, Estimated.)†	Death Rates, 1911, of Children Under One Year, Per 1,000 Births, 1910.
* Boston	27,674	686,092	24.8	720,031	16.99	26.31	125.58
Wards 1	1,188	29,676	24.9	31,578	13.54	24.92	115.59
2	357	28,812	80.7	30,095	16.87	32.63	101.69
3	332	15,339	46.2	15,565	15.26	25.52	109.69
4	301	13,294	44.1	13,648	17.05	27.54	100.82
5	207	12,811	61.9	12,882	15.33	20.36	153.26
6	293	35,758	122.0	38,328	16.06	50.50	109.46
7	394	14,913	37.9	14,617	22.03	29.90	137.08
8	171	32,430	189.6	33,152	13.10	35.57	90.83
9	186	26,427	141.5	28,345	18.12	26.72	125.18
10	394	25,320	64.3	25,979	13.55	11.11	67.38
11	663	27,444	41.4	29,711	10.74	12.80	101.69
12	235	24,294	103.4	25,432	15.41	16.15	137.06
13	611	21,561	35.3	21,520	21.87	32.80	142.86
14	405	23,584	58.2	24,233	14.95	25.59	99.17
15	277	21,216	76.6	21,620	14.41	23.15	107.72
16	564	25,633	45.6	27,285	13.42	24.00	129.24
17	460	26,426	57.4	27,367	17.52	27.12	122.39
18	220	22,735	103.3	23,009	18.66	25.04	128.07
19	760	31,714	41.7	32,828	13.37	24.04	95.42
20	1,716	55,720	32.5	61,917	16.46	19.66	‡298.10
21	640	30,511	20.5	32,283	14.52	17.50	76.35
22	760	29,975	38.1	30,958	12.32	22.58	97.20
23	7,617	30,668	4.0	32,564	11.13	19.42	76.79
24	3,252	37,749	11.6	40,465	12.87	22.50	104.09
25	2,740	26,575	9.7	28,699	11.90	21.14	98.94
26	2,931	15,507	5.3	15,951	13.46	29.84	68.97

* Hyde Park was annexed to Boston January 1, 1912, and became Ward 26. Under "Boston," in the above table, Hyde Park statistics are included.

† Population estimated by arithmetical method used by Census Bureau

‡ An infant asylum is located in this ward.

December. General Summary.

	1912.	1911.
Total deaths	996	935
Population, estimated*	720,031	688,912
Death rate per 1,000	16.29	15.98
Deaths of nonresidents	127	95
Corrected death rate†	14.21	14.36

*Population estimated by arithmetical method used by Census Bureau.
†Nonresidents not included.

December, 1912. Statement of Deaths.

Total number (stillbirths excluded)	996
Sex.	
Males	511
Females	485
Condition.	
Single	433
Married	362
Widowed	187
Divorced	8
Unknown	6
Color.	
White	975
Black (negro or mixed)	19
Chinese	2
Deaths of children:	
Under one year	158
Under two years	198
Under five years	242
Stillbirths during the month,	60

Nativity.	
United States	599
Ireland	167
England and Wales	38
Scotland	8
Germany	22
Canada	61
Italy	27
Russia and Poland	38
Sweden and Norway	11
France	—
Other countries	12
Unknown	13
Nativity of Mothers.	
United States	265
Ireland	312
England and Wales	41
Scotland	20
Germany	31
Canada	72
Italy	74
Russia and Poland	55
Sweden and Norway	14
France	2
Other countries	20
Unknown	90

Abridged List Class Number.	Causes of Death.	Totals. December, 1912.	Totals. December, 1911.	Under 1 Year.	1 Year.	2 Years.	3 Years.	4 Years.	Under 5 Years.	5 to 9 Years.	10 to 14 Years.	15 to 19 Years.
	Total, all causes {1912 / 1911}	996 /	..... / 935	158 / 138	40 / 21	26 / 15	11 / 7	7 / 10	242 / 191	19 / 25	17 / 5	17 / 15
1	Typhoid fever	4	2	.....	.....	.....	.....	.....	.....	.....	1	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	31	4	8	13	3	2	2	28	2	.....	.....
6	Scarlet fever	8	2	1	1	1	1	1	5	2	1	.....
7	Whooping cough	9	5	5	1	.....	1	.....	7	2	.....	.....
8	Diphtheria and croup	15	15	3	2	3	.....	.....	8	4	2	1
9	Influenza	3	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	2	4	1	.....	.....	.....	.....	1	.....	.....	.....
13	Tuberculosis of the lungs	83	91	1	1	2	.....	.....	4	1	1	4
14	Tuberculous meningitis	12	10	5	1	3	1	.....	10	.....	1	.....
15	Other forms of tuberculosis	7	4	1	.....	.....	.....	.....	1	.....	2	.....
16	Cancer, malignant tumor	73	63	.....	.....	.....	.....	.....	.....	.....	.....	.....
17	Simple meningitis (except cerebro-spinal meningitis).	3	3	.....	1	.....	.....	.....	1	.....	.....	.....
17a	Cerebro-spinal meningitis	2	1	1	.....	.....	.....	1	2	.....	.....	.....
18	Apoplexy and softening of the brain	45	49	.....	.....	.....	.....	.....	.....	.....	.....	.....
19	Organic heart diseases	138	129	.....	.....	.....	.....	.....	.....	1	1	3
20	Acute bronchitis	12	5	7	.....	1	.....	.....	8	.....	.....	.....
21	Chronic bronchitis	10	5	.....	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	109	92	14	6	6	1	.....	27	.....	2	1
22a	Broncho-pneumonia	53	42	13	6	5	.....	1	25	.....	.....	1
23	Other respiratory diseases	7	10	2	2	.....	.....	.....	4	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	7	14	1	.....	.....	.....	.....	1	.....	.....	.....
25	Diarrhea and enteritis (under two years).	16	17	15	1	.....	.....	.....	16	.....	.....	.....
26	Appendicitis and typhlitis	10	6	.....	.....	.....	.....	.....	.....	2	1	3
27	Hernia, intestinal obstruction	13	10	2	.....	.....	.....	.....	2	.....	.....	.....
28	Cirrhosis of liver	6	7	.....	.....	.....	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	68	55	1	.....	1	.....	.....	2	.....	.....	.....
30	Diseases of women (not cancer)	7	5	.....	.....	.....	.....	.....	.....	.....	.....	.....
31	Puerperal septicemia	4	3	.....	.....	.....	.....	.....	.....	.....	.....	.....
32	Other puerperal diseases	5	3	.....	.....	.....	.....	.....	.....	.....	.....	1
33	Congenital debility and malformations.	52	55	51	.....	1	.....	.....	52	.....	.....	.....
34	Old age	.....	4	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	58	49	2	1	2	.....	1	6	2	2	2
36	Suicide	5	14	.....	.....	.....	.....	.....	.....	.....	.....	.....
37	Other diseases	117	151	22	4	3	.....	1	.....	3	3	1
38	Ill-defined causes	2	2	2	.....	.....	.....	.....	.....	.....	.....	.....

20 to 24 Years.	25 to 29 Years.	30 to 34 Years.	35 to 39 Years.	40 to 44 Years.	45 to 49 Years.	50 to 54 Years.	55 to 59 Years.	60 to 64 Years.	65 to 69 Years.	70 to 74 Years.	75 to 79 Years.	80 to 84 Years.	85 to 89 Years.	90 Years and over.	Sex. Males.	Sex. Females.	Abridged List Class Number.
27	37	42	55	60	57	72	55	74	73	67	42	21	12	7	511	485	
29	36	42	57	61	66	64	63	66	79	52	44	26	10	4	510	425	
1	.....	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	.....	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4
1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	12	19	5
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	6	2	6
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	7	7
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	7	8	8
.....	.....	.....	.....	.....	.....	1	.....	.....	.....	2	.....	.....	.....	.....	2	1	9
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	1	1	12
9	10	6	16	10	4	3	5	4	4	.....	1	1	.....	.....	45	38	13
.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	3	9	14
.....	.....	2	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	6	1	15
.....	.....	3	5	6	8	11	4	9	12	5	6	2	2	.....	20	53	16
.....	.....	.....	.....	1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	2	1	17
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	17a
.....	.....	2	1	1	7	4	3	5	4	7	5	2	2	2	21	24	18
1	3	4	5	11	5	11	12	19	16	25	14	5	1	1	58	80	19
.....	.....	.....	.....	.....	.....	.....	.....	1	.....	1	1	.....	.....	1	7	5	20
.....	.....	.....	1	1	1	1	.....	.....	1	1	1	2	1	.....	5	5	21
.....	7	5	9	5	10	8	7	5	6	8	4	2	2	1	66	43	22
.....	.....	.....	3	2	2	4	1	2	3	5	3	1	1	.....	20	33	22a
.....	.....	.....	.....	.....	.....	.....	1	1	.....	.....	1	.....	.....	.....	6	1	23
1	2	.....	1	.....	.....	1	.....	.....	.....	1	.....	.....	.....	.....	2	5	24
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	11	5	25
1	.....	.....	.....	1	.....	.....	1	.....	1	.....	.....	.....	.....	.....	3	7	26
.....	1	1	.....	1	.....	3	.....	2	2	.....	1	.....	.....	.....	6	7	27
.....	.....	1	1	1	1	1	1	.....	.....	.....	.....	.....	.....	.....	3	3	28
2	.....	1	.....	4	8	11	6	12	12	4	1	4	1	.....	37	31	29
1	1	1	.....	2	1	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	7	30
1	1	1	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	31
.....	2	1	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	5	32
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	35	17	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	34
5	5	6	4	4	4	3	5	4	3	3	.....	.....	.....	.....	43	15	35
1	1	.....	1	.....	.....	1	.....	.....	1	.....	.....	.....	.....	.....	3	2	36
3	3	8	4	8	6	8	9	10	8	4	3	1	3	2	73	44	37
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	1	38

Abridged List Class Number.	Causes of Death.	Boston.	Ward Residence.										
			1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.
	All causes	996	26	43	26	16	20	46	28	33	46	25	30
	Rates per 1,000 population {Dec., 1912	16.29	9.69	16.82	19.67	13.80	18.28	14.13	22.55	11.72	19.11	11.33	11.89
	{Dec., 1911	15.98	13.42	15.16	20.56	11.35	20.16	10.77	15.16	11.84	15.85	14.67	7.80
1	Typhoid fever	4	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
3	Malarial fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
4	Smallpox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
5	Measles	31	.....	1	.....	.....	.....	2	1	.....	.....	.....	.....
6	Scarlet fever	8	.....	.....	.....	.....	.....	.....	.....	1	2	.....	.....
7	Whooping cough	9	.....	1	.....	.....	.....	3	.....	.....	.....	.....	.....
8	Diphtheria and croup	15	.....	1	.....	2	.....	3	.....	.....	.....	.....	.....
9	Influenza	3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
12	Other epidemic diseases	2	.....	.....	.....	.....	.....	1	1	.....	.....	.....	.....
13	Tuberculosis of the lungs	83	.....	2	3	1	3	2	1	3	6	3	4
14	Tuberculous meningitis	12	2	.....	.....	.....	.....	.....	.....	2	.....	1	1
15	Other forms of tuberculosis	7	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....
16	Cancer, malignant tumor	73	.....	2	2	.....	.....	1	1	3	2	6	4
17	Simple meningitis (except cerebro-spinal meningitis).	3	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
17a	Cerebro-spinal meningitis	2	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
18	Apoplexy and softening of the brain.	45	1	3	1	1	.....	2	3	1	2	.....	.....
19	Organic heart diseases	138	3	6	7	.....	3	3	6	5	5	4	6
20	Acute bronchitis	12	1	.....	.....	.....	1	.....	.....	.....	.....	.....	.....
21	Chronic bronchitis	10	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....
22	Pneumonia (except broncho-pneumonia).	109	3	8	5	2	1	6	5	4	9	4	2
22a	Broncho-pneumonia	53	1	6	.....	4	.....	2	2	3	2	2	1
23	Other respiratory diseases	7	1	.....	.....	1	.....	2	.....	.....	.....	.....	.....
24	Diseases of the stomach (cancer excepted).	7	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....
25	Diarrhea and enteritis (under two years).	16	.....	.....	2	.....	.....	3	.....	.....	.....	.....	.....
26	Appendicitis and typhlitis	10	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	1
27	Hernia, intestinal obstruction,	13	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....
28	Cirrhosis of liver	6	1	.....	.....	.....	1	.....	.....	.....	.....	.....	.....
29	Bright's disease and nephritis	68	4	3	.....	1	3	1	4	1	5	1	2
30	Diseases of women (not cancer),	7	.....	.....	.....	.....	.....	.....	.....	3	.....	1	.....
31	Puerperal septicemia	4	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
32	Other puerperal diseases	5	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....
33	Congenital debility and malformations.	52	1	3	1	.....	1	2	.....	.....	7	.....	1
34	Old age	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
35	Violent deaths	58	.....	.....	1	1	3	4	.....	4	3	1	4
36	Suicide	5	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....
37	Other diseases	117	7	4	2	3	4	6	4	2	2	1	4
38	Ill defined causes	2	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....
	Total deaths under one year	158	3	8	3	3	4	11	1	4	10	1	3

Ward Residence.															Boston, Ward Unknown.	Nonresidents.	Unknown.	Abridged List Class Number.
12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.	24.	25.	26.				
36	30	28	24	28	37	26	41	65	42	34	32	52	28	18	....	127	9	....
16.67	16.41	13.60	13.07	12.08	15.92	13.30	14.71	12.36	15.32	12.93	11.57	15.13	11.49	13.29	....	....	....	....
12.76	25.15	14.26	12.63	11.98	20.54	14.41	14.21	16.13	14.59	11.96	11.88	13.20	13.16	.....	....	....	....	....
.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	3	...	1
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	3
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	4
1	.....	1	.....	.....	1	1	3	9	1	1	.....	2	.....	.....	....	6	1	5
1	.....	1	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	1	...	6
.....	.....	3	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....	....	....	...	7
.....	.....	.....	.....	.....	1	.....	2	.....	.....	1	2	.....	1	.....	....	2	...	8
.....	.....	.....	.....	1	1	1	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	9
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	12
3	5	1	2	2	3	4	2	11	2	1	4	2	2	2	....	9	...	13
1	.....	1	.....	2	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	....	1	...	14
.....	.....	.....	.....	.....	.....	2	.....	1	.....	1	.....	.....	.....	.....	....	2	...	15
2	2	1	1	1	1	3	4	7	3	4	3	4	5	1	....	10	...	16
.....	.....	.....	.....	.....	1	.....	.....	.....	1	.....	.....	.....	.....	.....	....	....	...	17
.....	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	....	....	...	17a
1	1	1	.....	.....	2	2	1	3	4	3	3	2	3	1	....	4	...	18
4	6	5	8	6	4	6	4	7	8	8	5	5	2	4	....	8	...	19
.....	.....	.....	1	.....	2	1	.....	2	2	.....	.....	2	.....	.....	....	....	...	20
.....	1	.....	.....	1	.....	.....	1	.....	1	1	.....	3	.....	.....	....	1	...	21
2	5	3	.....	5	6	1	7	4	3	4	3	8	1	3	....	5	...	22
1	1	.....	5	1	2	1	1	2	4	1	1	5	.....	1	....	2	2	22a
.....	.....	1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	....	1	...	23
.....	.....	.....	1	.....	1	.....	.....	2	.....	.....	.....	.....	.....	1	....	....	...	24
1	.....	1	1	.....	.....	.....	.....	2	.....	1	.....	.....	.....	.....	....	2	3	25
1	.....	.....	.....	.....	.....	1	.....	1	.....	.....	.....	.....	1	1	....	3	...	26
.....	.....	1	.....	.....	1	.....	.....	.....	.....	1	1	1	.....	.....	....	7	...	27
.....	.....	1	.....	.....	1	.....	.....	.....	1	.....	.....	.....	.....	.....	....	1	...	28
5	1	1	1	3	.....	2	5	3	6	4	2	5	1	1	....	3	...	29
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	1	.....	....	1	...	30
.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	....	1	...	31
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2	.....	.....	....	2	...	32
4	4	1	.....	1	2	.....	3	2	1	1	.....	3	4	3	....	6	1	33
.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	34
1	4	.....	2	.....	.....	1	2	4	1	1	2	1	1	.....	....	16	1	35
.....	.....	.....	.....	.....	1	.....	.....	1	.....	.....	1	1	.....	.....	....	....	...	36
8	.....	4	1	3	6	.....	5	4	3	1	3	6	3	.....	....	30	1	37
.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	....	....	...	38
7	7	8	2	3	6	2	8	9	3	4	5	9	6	7	....	15	6	

VITAL STATISTICS.

December, 1912, Infant Mortality.

Detailed List Class Number.	Causes of Death.	December Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
	Total	158	138	19	4	5	11	10	8	5	16	13	31	19	17	28	81	15
	Male	96	79	15	1	4	8	7	3	3	10	9	15	13	8	16	45	8
	Female	62	59	4	3	1	3	3	5	2	6	4	16	6	9	12	36	7
	White	153	137	16	4	5	11	10	8	5	16	13	31	18	16	28	2	15
	Colored	5	1	3	...	...	...	...	...	...	...	...	...	1	1	.....	2	...
1	Typhoid fever	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
5	Smallpox	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
6	Measles	8	.....	...	...	...	...	...	...	...	...	...	...	2	6	1	7	2
7	Scarlet fever	1	1	...	...	...	...	...	...	...	...	...	...	...	1	1	.....	...
8	Whooping cough	5	2	...	...	...	...	...	...	...	2	1	1	1	...	2	3	...
9	Diphtheria and croup	3	.....	...	...	...	...	...	...	...	1	...	1	...	1	.....	3	...
10	Influenza	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
14	Dysentery	.....	1	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
18	Erysipelas	1	1	...	...	...	...	...	...	...	...	...	1	...	...	1	.....	...
19	Other epidemic diseases	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
20	Pus-infection and septicemia,	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
24	Tetanus	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
28	Tuberculosis of the lungs	1	.....	...	...	...	...	...	...	...	...	...	...	1	...	.....	1	..
29	Acute miliary tuberculosis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
30	Tuberculous meningitis	5	1	...	...	...	...	...	...	...	1	...	2	1	1	1	4	...
31 35	Other forms of tuberculosis	1	.....	...	...	...	...	...	...	...	...	...	1	...	...	.....	1	1
36	Rickets	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
37	Syphilis	3	4	...	...	...	...	1	...	...	...	...	2	...	...	.....	2	...
38	Gonococcus infection	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
61	Simple meningitis	.....	2	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
61a	Cerebro-spinal fever	1	.....	...	...	...	...	...	...	...	...	...	1	...	...	.....	1	...
63a	Acute poliomyelitis	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
71	Convulsions	1	1	...	...	...	...	...	...	...	...	1	...	...	...	.....	1	...
76	Diseases of the ears	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
79	Organic diseases of the heart,	.....	.....	...	...	...	...	...	...	...	...	...	...	...	...	.....	.....	...
89	Acute bronchitis	7	1	...	...	...	1	1	...	1	1	1	2	...	...	1	4	...
91	Broncho-pneumonia	13	20	...	...	...	...	1	1	...	1	...	4	4	2	4	8	..
92	Pneumonia	14	12	...	...	...	...	1	1	...	2	...	3	5	2	7	6	1
93	Pleurisy	1	.....	...	...	...	...	...	...	...	...	...	...	1	...	.....	1	...
103	Other diseases of stomach	1	1	...	...	...	...	1	...	...	...	...	...	...	...	.....	.....	...

December Infant Mortality.— *Concluded.*

Detailed List Class Number.	Causes of Death.	December Totals, Under 1 Year.		Under 1 Day.	1 to 2 Days.	2 to 3 Days.	3 Days to 1 Week.	1 to 2 Weeks.	2 to 3 Weeks.	3 Weeks to 1 Month.	1 to 2 Months.	2 to 3 Months.	3 to 6 Months.	6 to 9 Months.	9 to 12 Months.	Aged 2 Weeks and Over.		Nonresidents.
		1912.	1911.													Breast Fed.	Bottle Fed.	
104	Diarrhea and enteritis	15	14	...	...	...	...	...	...	...	1	5	6	2	1	3	12	2
108	Appendicitis and typhlitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
109	Hernias, intestinal obstruction,	2	...	...	...	...	...	..	...	...	...	...	2	...	...	1	1	1
117	Simple peritonitis	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
119	Acute nephritis	1	...	...	...	...	...	...	...	...	...	1	...	...	...	...	1	...
143	Furuncle	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
144	Acute abscess	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
145	Other diseases of skin, etc.	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
150*a*	Hydrocephalus	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
b	Congenital malformations of heart	12	8	...	...	1	3	1	3	...	2	...	...	1	1	1	6	2
c	Other malformations	4	...	1	...	...	...	...	1	...	2	...	...	...	...	1	2	...
151*a*	Premature birth	28	...	11	2	2	3	2	1	3	2	2	...	...	...	1	7	3
b	Congenital debility	7	45	...	1	...	...	...	...	1	...	1	3	1	...	1	5	1
152*a*	Injuries at birth	11	...	5	...	1	3	1	1	...	...	...	...	...	...	...	1	1
b	Other causes peculiar to early infancy	6	16	2	1	1	...	1	...	...	...	1	...	...	...	1	...	1
167	Burns (conflagrations excepted)	1	...	...	...	...	...	...	...	...	...	...	...	...	1	1	...	...
168	Absorption of deleterious gases	1	...	...	...	...	..	...	...	...	...	...	1	..	...	...	1	...
172	Traumatism by fall	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
182, 184	Homicide	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
187, 189	Ill-defined diseases	2	1	...	...	...	...	...	...	...	...	...	1	...	1	...	2	...
	Other causes	2	7	...	...	...	1	...	...	...	1	...	...	...	...	...	1	...
	Breast fed *	28	27	...	...	...	...	...	2	1	6	5	6	3	5	28	...	2
	Bottle fed *	81	59	...	...	...	...	...	6	4	10	8	25	16	12	...	81	9
	Nonresidents	15	6	1	...	1	2	...	...	1	1	3	3	2	1	2	9	15

* Aged two weeks and over.

Additional Deaths for Other Months.

June, 1912.— 1 female; Bright's disease; white; aged 69 years; widow; residence Ward 2; born in Ireland; mother born in Ireland.

Aug., 1912.— 1 male; tuberculosis of lungs; white; aged 34 years; single; residence Ward 6; birthplace unknown; birthplace of mother unknown.

1 female; alcoholism; white; aged 40 years; condition unknown; residence Ward 10; birthplace unknown; birthplace of mother unknown.

1 male; alcoholism; white; aged 29 years; single; residence Ward 19; birthplace United States; birthplace of mother Ireland.

Sept., 1912.— 1 male; tuberculosis of lungs; white; aged 40 years; single; residence Ward 6; born in Scandinavia; mother born in Scandinavia.

1 male; alcoholism; white; aged 57 years; single; residence Ward 9; birthplace unknown; birthplace of mother unknown.

1 female; pneumonia; white; aged 57 years; widow; residence Ward 8; born in Canada; mother born in Canada.

1 male; accidental drowning; white; aged 25 years; condition unknown; residence unknown; birthplace unknown; birthplace of mother unknown.

Additional Deaths for Other Months.— *Concluded.*

Oct., 1912.— 1 male; tuberculosis of lungs; white; aged 50 years; condition unknown; residence Ward 6; birthplace unknown; birthplace of mother unknown.
1 female; diabetes; black; aged 49 years; married; residence Ward 6; born in United States; birthplace of mother unknown.
1 female; alcoholism; white; aged 35 years; married; residence Ward 1; born in Ireland; mother born in Ireland.
1 male; alcoholism; white; aged 50 years; single; residence Ward 8; birthplace unknown; birthplace of mother unknown.
1 male; traumatism by other crushing; white; aged 60 years; condition unknown; nonresident; birthplace unknown; birthplace of mother unknown.
1 male; suicide by poison; white; aged 24 years; single; residence unknown; birthplace unknown; birthplace of mother unknown.
Nov., 1912.— 1 male; Bright's disease; black; aged 35 years; condition unknown; residence Ward 7; birthplace unknown; birthplace of mother unknown.
1 male; accidental drowning; white; aged 42 years; condition unknown; residence Ward 8; birthplace, other foreign; birthplace of mother unknown.
1 male; traumatism by fall; white; aged 58 years; single; residence Ward 9; born in United States; birthplace of mother unknown.
1 male; traumatism by fall; white; aged 74 years; condition unknown; residence Ward 7; born in United States; mother born in United States.
1 male; alcoholism; white; aged 52 years; married; residence Boston; birthplace unknown; birthplace of mother unknown.
1 male; alcoholism; white; aged 45 years; condition unknown; residence Ward 2; birthplace unknown; birthplace of mother unknown.
1 male; alcoholism; white; aged 48 years; single; nonresident; birthplace unknown; birthplace of mother unknown.
1 male; alcoholism; white; aged 40 years; single; residence Ward 20; born in United States; mother born in Ireland.
1 female; alcoholism; white; aged 30 years; condition unknown; residence unknown; birthplace unknown; birthplace of mother unknown.
1 male; traumatism by other crushing; black; aged 18 years; condition unknown; nonresident; born in United States; birthplace of mother unknown.
1 male; traumatism by other crushing; white; aged 62 years; single; residence Ward 24; born in other foreign; birthplace of mother unknown.
1 female; sudden death; white; aged 45 years; condition unknown; residence unknown; birthplace unknown; birthplace of mother unknown.
1 female; ill defined; white; aged 65 years; condition unknown; residence unknown; birthplace unknown; birthplace of mother unknown.
May, 1912.— 1 stillbirth.

COMMUNICABLE DISEASES.

DIVISION OF COMMUNICABLE DISEASES, DECEMBER, 1912.

Medical Inspectors.

New cases visited:	
Diphtheria:	
a. Isolation	101
b. Diagnosis	12
Scarlet fever:	
a. Isolation	137
b. Diagnosis	26
c. Release	51
Measles:	
a. Isolation	7
b. Diagnosis	8
Varicella:	
a. Isolation	4
b. Diagnosis	8
Ophthalmia neonatorum	10
Tuberculosis	50
Deaths investigated	15
Vaccinations performed	12
Certificates of vaccination issued	8

Nurses.

New cases visited:	
Diphtheria	128
Scarlet fever	175
Measles	590
Varicella	142
Typhoid fever	20
Whooping cough	84
Ophthalmia neonatorum	92
Mumps	31
Cerebro-spinal meningitis	2
Malaria	1
Trachoma	3
Trichinosis	1
Release cultures taken for diphtheria	92

Old cases visited:

Diphtheria	152
Scarlet fever	266
Measles	634
Varicella	107
Typhoid fever	32
Whooping cough	75
Ophthalmia neonatorum	209
Mumps	6
Trachoma	1

Disinfections.

Diphtheria	147
Scarlet fever	163
Tuberculosis	201
Infected bedding	2 lots
Infected books, etc.	7 lots
Infected clothing, etc.	1 lot
Infected carriages	3

Forcible Removals.

Tuberculosis	2
Scarlet fever	8

DIVISION OF

December, 1912. Cases Reported.

Wards.	Anterior Poliomyelitis.	Actinomycosis.	Asiatic Cholera.	Bubonic Plague.	Cerebro-spinal Meningitis.	Diphtheria.	Glanders.	Leprosy.	Malaria.	Malignant Pustule.	Measles.	Mumps.	Ophthalmia Neonatorum.
1	....	....	....	....	....	8	....	....	....	....	6	....	7
2	....	....	....	....	....	6	....	....	....	....	10	8	6
3	....	....	....	....	....	3	....	....	....	....	1	1	5
4	....	....	....	....	....	6	....	....	....	....	2	....	2
5	....	....	....	....	....	5	....	....	....	....	1	....	1
6	....	....	....	....	1	9	....	....	1	....	42	6	9
7	....	....	....	....	....	1	....	....	....	....	29	1	6
8	....	....	....	....	....	10	....	....	....	....	79	....	8
9	....	....	....	....	....	4	....	....	....	....	59	....	9
10	....	....	....	....	....	3	....	....	....	....	8	2	2
11	....	....	....	....	....	....	....	....	....	....	4	2	3
12	....	....	....	....	....	16	....	....	....	....	21	13	6
13	....	....	....	....	....	10	....	....	....	....	2	1	3
14	....	....	....	....	....	1	....	....	....	....	10	....	2
15	....	....	....	....	....	1	....	....	....	....	15	....	3
16	....	....	....	....	....	9	....	....	....	....	7	1	5
17	....	....	....	....	....	7	....	....	....	....	63	4	4
18	....	....	....	....	....	....	....	....	....	....	48	....	2
19	....	....	....	....	1	8	....	....	....	....	59	....	1
20	....	....	....	....	....	19	....	....	....	....	114	2	5
21	....	....	....	....	....	4	....	....	....	....	18	1	2
22	....	....	....	....	....	6	....	....	....	....	13	1	2
23	....	....	....	....	....	11	....	....	....	....	10	3	1
24	....	....	....	....	....	2	....	....	....	....	48	2	1
25	....	....	....	....	....	6	....	....	....	....	3	1	....
26	....	....	....	....	....	2	....	....	....	....	....	....	....
Total	....	....	....	....	2	157	....	....	1	....	672	49	95
Unknown	....	....	....	....	....	....	....	....	....	....	....	....	....
Nonresidents	....	....	....	....	....	14	....	....	....	....	5	....	13
Grand total	....	....	....	....	2	171	....	....	1	....	677	49	108
Corresponding month last year	....	....	....	....	2	227	....	....	3	....	287	18	98

COMMUNICABLE DISEASES.

Cases Reported. **December, 1912.**

Scarlet Fever.	Smallpox.	Tetanus.	Trachoma.	Trichinosis.	Tuberculosis (Pulmonary and Miliary).	Tuberculosis (Other Forms).	Typhoid Fever.	Typhus Fever.	Varicella.	Whooping Cough.	Yellow Fever.	Wards.
9	....	....	....	....	3	1	4	....	15	3	....	1
10	....	....	....	....	6	1	2	....	1	2	....	2
2	....	....	....	....	5	1	....	....	.....	1	....	3
4	....	....	....	....	3	....	....	....	.....	.....	....	4
2	....	....	....	....	7	....	....	....	.....	2	....	5
5	....	....	....	....	15	1	2	....	5	5	....	6
.....	....	....	1	....	22	....	1	....	1	3	....	7
4	....	....	....	....	27	2	....	....	9	3	....	8
16	....	....	....	1	16	2	....	....	6	4	....	9
3	....	....	....	....	4	....	1	....	.....	2	....	10
.....	....	....	....	....	7	....	1	....	6	.....	....	11
12	....	....	....	....	14	....	1	....	12	.....	....	12
2	....	....	....	....	4	1	....	....	.....	7	....	13
14	....	....	....	....	9	....	2	....	5	17	....	14
1	....	....	....	....	9	....	....	....	2	7	....	15
10	....	....	....	....	14	1	....	....	7	5	....	16
14	....	....	....	....	15	....	1	....	5	18	....	17
3	....	....	....	....	13	2	....	....	1	7	....	18
3	....	....	1	....	12	2	....	....	2	3	....	19
16	....	....	1	....	15	....	1	....	29	1	....	20
10	....	....	....	....	3	1	1	....	4	10	....	21
4	....	....	....	....	8	1	....	....	1	2	....	22
22	....	....	....	....	9	1	....	....	14	4	....	23
8	....	....	....	....	5	....	....	....	20	8	....	24
12	....	....	....	....	7	2	1	....	1	7	....	25
3	....	....	....	....	1	1	....	....	.....	.....	....	26
189	....	....	3	1	253	20	18	....	146	121	....	Total
.....	....	....	....	....	.....	....	....	....	.....	.....	....	Unknown
10	....	1	1	....	10	5	2	....	.....	.....	....	Nonresidents
199	....	1	4	1	263	25	20	....	146	121	....	Grand total
117	....	1	7	....	231	30	30	....	177	86	....	Corresponding month last year.

1. Medical Inspection of Schools.

Number inspections made	11,681
Number physical examinations made	13,391
Number visits made to homes	117

There were 1,608 pupils excluded from schools during this month on account of contagious diseases, as follows:

Diphtheria	2	Chicken pox	37
Scarlet fever	6	Pediculosis	996
Measles	9	Acute or purulent conjunctivitis	19
German measles	3	Ringworm	20
Whooping cough	8	Scabies	24
Mumps	17	Impetigo	65
Pulmonary tuberculosis	88	Miscellaneous	319
Acute tonsilitis	70		
Influenza	5		

There were 307 cultures taken during the month.

There were 15,839 cases of noncontagious disease found, subdivided as follows:

Diseases of oral and respiratory tract	4,203
Diseases of ear	124
Diseases of eye	375
Diseases of skin	965
Dental caries	5,219
Miscellaneous diseases	4,953

2. Physical Examination of Licensed Minors.

There were 374 children between the ages of 14 and 16 years of age examined during the month. One hundred and thirty-two were found to be without defects and 242 with defects as follows:

Hearing	2	Cervical glands	19
Eyesight	45	Pulmonary tuberculosis	1
Mental deficiency	1	Cardiac disease	3
Defective nasal breathing	12	Nervous disease	1
Hypertrophied tonsils	26	Orthopedic defects	22
Defective teeth	158	Skin	4
Malnutrition	4	Miscellaneous	54

Certificates were refused to eight applicants.

3. Pre-Natal and Post-Natal Work.

Pre-Natal.

Number cases	85	Number babies born	8
Number visits	110	Number babies breast fed	8

The following defective conditions were noted:

Varicose veins	8	Miscarriages	2
Oedema	4		

Mothers attended as follows:

Family physician	3	Hospital	5

Post-Natal.

Number cases	999	Bottle-fed babies	99
Number visits	3,134	Both feedings	75
Breast-fed babies	825		

Defective Conditions Noted.

Improper feeding	62	Umbilical hernia	4
Ophthalmia	36	Cervical abscess	1
Skin disease	29	Cervical glands	2
Whooping cough	5	Orthopedic defects	2

BACTERIOLOGICAL LABORATORY.

DIPHTHERIA:					
Positive for diagnosis			97		
Positive for release			45		
Negative for diagnosis			1,504		
Negative for release			215		
"No growth" cultures			23	—	1,884
TUBERCULOSIS:					
Positive			78		
Negative			408		
Unsatisfactory			0	—	486
TYPHOID:					
Positive			10		
Negative			102		
Atypical			4	—	116
GLANDERS:	Strauss.	C.	F.	Ag.	
Positive	1	13	7	21	
Negative	5	36	34	75	
Unsatisfactory	2	0	0	2	
Atypical	0	2	10	12	—110

GONORRHEA:			
Positive	30		
Negative	138		
Unsatisfactory	0	—	168
GONORRHEAL OPHTHALMIA:			
Positive	0		
Negative	34		
Unsatisfactory	0	—	34
*OTHER EXAMINATIONS:			
Positive	11		
Negative	21		
Unsatisfactory	1	—	33
BACTERIOLOGICAL MILK EXAMINATIONS	0	—	794
Total	3,625		3,625

SPECIAL WORK:
Longevity of tubercle bacilli in cow feces.
Bacteriological examination of water.

* K-L Vir. Organisms, leprosy, malaria, actinomycosis, G-U. T. B., influenza, paratyphoid, typhoid feces and urine.

INSPECTION OF MILK, VINEGAR, ETC.

Examination as to Statute Requirements.

Samples examined,	milk	from stores	597
"	"	from wagons	664
"	"	brought in by citizens	34
"	"	for bacteriological examination	794
"	"	vinegar	146
"	"	butter and cheese	154
"	"	candy	23
Total samples			2,412

INSPECTION OF DAIRIES.

Satisfactory * on first inspection	205	
Satisfactory on later inspection	177	
		382
Unsatisfactory on first inspection	186	
Unsatisfactory on later inspection	67	
		253
Total number of inspections		635
Dairies having milk rooms	293	
Dairies without milk rooms	342	
Number of cows inspected	6,753	
Number of dairies prohibited shipping milk to Boston because of insanitary conditions of premises	49	

* "Satisfactory" means having a score of at least 45 per cent. by the government score card.

LIVE STOCK INSPECTED.—BRIGHTON ABATTOIR.

Cattle inspected	514	Cattle condemned (1 and parts),	2,186 lbs.
Calves inspected	341	Calves condemned	— lbs.
Sheep inspected	—	Sheep condemned	— lbs.
Swine inspected	6,807	Swine condemned (9 and parts),	3,505 lbs.

INSPECTION OF PROVISIONS.— ARTICLES CONDEMNED.

Meats.		Miscellaneous.	
Veal (immature)	— lbs.	Lobster (dead)	— lbs.
Mutton (tainted)	— lbs.	Fish (tainted)	27 lbs.
Beef (tainted)	89 lbs.	Apples (decayed)	— bush.
Pork (tainted)	12 lbs.	Vegetables (decayed)	69 bush.
Poultry (tainted)	1,001 lbs.	Canned goods (tainted)	58 cans.

SANITARY INSPECTION DIVISION.

New reports	2,459
Reinspections	7,838
New tenement house reports	665
Nuisances reported	5,125
Legal notices	329
Court cases	5
Fines	$50
Tenements vacated	21
Houses demolished	2
Milk applications approved	117
Stable hearings	3
Stable permit granted	1
Stable permit withheld	1
Stable permit refused	1
Dump permits	3

QUARANTINE.

Vessels inspected at quarantine	52
Total immigrants arriving in Boston	3,107

Provisional Summary of Vital Statistics for the Year 1912 Compared with 1911.

	1912.	1911.
Population (estimated by arithmetical method used by Census Bureau).	720,031	688,912
Deaths from all causes (stillbirths excluded)	11,639	11,767
Death rate per 1,000 inhabitants	16.16	17.08
Deaths of nonresidents	1,447	1,349
Corrected death rate per 1,000 inhabitants	14.15	15.12
Deaths of children under one year	2,183	2,248
Births so far reported to Registry Department	18,284	17,962
Death rate of children under one year per 1,000 births	119.39	125.15
Estimated total number of births	19,000	.....
Estimated rate per 1,000 births	114.89	.....
Total number of stillbirths	742	715

Causes of Death.

	I. General Diseases.	1912.	1911.
1	Typhoid fever	57	63
4	Malaria	1	4
5	Smallpox	.....	1
6	Measles	111	74
7	Scarlet fever	32	74
8	Whooping cough	75	108
9	Diphtheria and croup	102	124
10	Influenza	27	46
12	Asiatic cholera	.....	1
13	Cholera nostras	1	1
14	Dysentery	8	3
18	Erysipelas	48	56
19	Other epidemic diseases	4	4
20	Purulent infection and septicemia	27	22
22	Anthrax	1	.....
24	Tetanus	3	9
25	Mycoses	1	2
26	Pellagra	1	.....

	Causes of Death.	1912.	1911.
28	Tuberculosis of the lungs	1,053	1,037
29	Acute miliary tuberculosis	40	30
30	Tuberculous meningitis	107	130
31	Abdominal tuberculosis	35	33
32	Pott's disease	7	6
33	White swellings	3	2
34	Tuberculosis of other organs	13	15
35	Disseminated tuberculosis	14	.....
36	Rickets	4	3
37	Syphilis	63	56
38	Gonococcus infection	1	5
39	Cancer and other malignant tumors of the buccal cavity	27	30
40	Cancer and other malignant tumors of the stomach, liver	252	235
41	Cancer and other malignant tumors of the peritoneum, intestines, rectum.	122	136
42	Cancer and other malignant tumors of the female genital organs	131	124
43	Cancer and other malignant tumors of the breast	98	93
44	Cancer and other malignant tumors of the skin	16	8
45	Cancer and other malignant tumors of other organs or of organs not specified.	139	143
46	Other tumors (tumors of the female genital organs excepted)	6	4
47	Acute articular rheumatism	26	27
48	Chronic rheumatism and gout	10	8
49	Scurvy	2	1
50	Diabetes	136	138
51	Exophthalmic goitre	11	6
52	Addison's disease	5	6
53	Leuchæmia	21	19
54	Anemia, chlorosis	57	53
55	Other general diseases	17	16
56	Alcoholism (acute or chronic)	225	165
57	Chronic lead poisoning	3	2
59	Other chronic poisonings	1	8
		3,144	3,150
	II. Diseases of the Nervous System and of the Organs of Special Sense.		
60	Encephalitis	9	10
61	(1) Simple meningitis	53	64
61	(2) Cerebro-spinal meningitis (undefined)	34	25
61	(3) Cerebro-spinal fever	2	8
62	Locomotor ataxia	14	13
63	Other diseases of the spinal cord	43	31

	Causes of Death.	1912.	1911.
64	Cerebral hæmorrhage, apoplexy	548	540
65	Softening of the brain	6	4
66	Paralysis without specified cause	26	35
67	General paralysis of the insane	45	35
68	Other forms of mental alienation	9	18
69	Epilepsy	15	9
71	Convulsions of infants	26	25
72	Chorea	.....	3
73	Neuralgia and neuritis	10	15
74	Other diseases of the nervous system	35	49
75	Diseases of the eyes and their annexa	2	4
76	Diseases of the ears	23	39
		900	927
	III. Diseases of the Circulatory System.		
77	Pericarditis	26	16
78	Acute endocarditis	66	49
79	Organic diseases of the heart	1,532	1,312
80	Angina pectoris	38	41
81	Diseases of the arteries, atheroma, aneurysm, etc.	182	164
82	Embolism and thrombosis	58	57
83	Diseases of the veins (varices, hæmorrhoids, phlebitis, etc.)	7	14
84	Diseases of the lymphatic system (lymphangitis, etc.)	23	30
85	Hæmorrhage; other diseases of the circulatory system	2	5
		1,934	1,688
	IV. Diseases of the Respiratory System.		
86	Diseases of the nasal fossæ	1	.....
87	Diseases of the larynx	10	4
88	Diseases of the thyroid body	5	3
89	Acute bronchitis	77	93
90	Chronic bronchitis	47	55
91	Broncho pneumonia	446	432
92	Pneumonia	959	902
93	Pleurisy	30	43
94	Pulmonary congestion, pulmonary apoplexy	12	17
95	Gangrene of the lung	2	6
96	Asthma	9	15
97	Pulmonary emphysema	3	4
98	Other diseases of the respiratory system (tuberculosis excepted)	9	7
		1,610	1,581

	Causes of Death.	1912.	1911.
	V. Diseases of the Digestive System.		
99	Diseases of the mouth and annexa	2	.....
100	Diseases of the pharynx	23	41
101	Diseases of the œsophagus	1	3
102	Ulcer of the stomach	32	38
103	Other diseases of the stomach (cancer excepted)	61	47
104	Diarrhea and enteritis (under two years)	591	696
105	Diarrhea and enteritis (two years and over)	65	89
107	Intestinal parasites	2	.....
108	Appendicitis and typhilitis	110	103
109	Hernia, intestinal obstruction	95	113
110	Other diseases of the intestines	10	10
111	Acute yellow atrophy of the liver	2	1
112	Hydatid tumor of the liver	.....	1
113	Cirrhosis of the liver	77	72
114	Biliary calculi	26	34
115	Other diseases of the liver	31	36
116	Diseases of the spleen	.....	1
117	Simple peritonitis (nonpuerperal)	26	25
118	Other diseases of the digestive system (cancer and tuberculosis excepted).	8	14
		1,162	1,324
	VI. Nonvenereal Diseases of the Genito-urinary System and Annexa.		
119	Acute nephritis	50	58
120	Bright's disease	680	747
122	Other diseases of the kidneys and annexa	23	25
123	Calculi of the urinary passages	9	7
124	Diseases of the bladder	9	5
125	Diseases of the urethra, urinary abscess, etc	12	11
126	Diseases of the prostate	41	46
127	Nonvenereal diseases of the male genital organs	.....	2
128	Uterine hemorrhage (nonpuerperal)	1	.....
129	Uterine tumor (noncancerous)	23	22
130	Other diseases of the uterus	16	8
131	Cysts and other tumors of the ovary	10	12
132	Salpingitis and other diseases of the female genital organs	22	26
		896	969
	VII. The Puerperal State.		
134	Accidents of pregnancy	11	17
135	Puerperal hemorrhage	10	4

	Causes of Death.	1912.	1911.
136	Other accidents of labor	7	15
137	Puerperal septicemia	56	41
138	Puerperal albuminuria and convulsions	32	27
139	Puerperal phlegmasia alba dolens, embolus, sudden death	6	5
140	Following childbirth (not otherwise defined)	.....	2
141	Puerperal diseases of the breast	1	.....
		123	111
	VIII. Diseases of the Skin and of the Cellular Tissue.		
142	Gangrene	19	22
143	Furuncle	4	8
144	Acute abscess	20	27
145	Other diseases of the skin and annexa	14	17
		57	74
	IX. Diseases of the Bones and of the Organs of Locomotion.		
146	Diseases of the bones (tuberculosis excepted)	38	41
147	Diseases of the joints (tuberculosis and rheumatism excepted)	4	10
149	Other diseases of the organs of locomotion	2	.....
		44	51
	X. Malformations.		
150	Congenital malformations (stillbirths not included)	151	157
	XI. Early Infancy.		
151	Congenital debility, icterus and sclerema	509	458
152	Other causes peculiar to early infancy	208	188
153	Lack of care	1	2
		718	648
	XII. Old Age.		
154	Senility	34	33
	XIII. External Causes.		
155	Suicide by poison	26	29
156	Suicide by asphyxia	35	30
157	Suicide by hanging or strangulation	2	13
158	Suicide by drowning	7	14
159	Suicide by firearms	29	28
160	Suicide by cutting or piercing instruments	5	11
161	Suicide by jumping from high places	4	3

	Causes of Death.	1912.	1911.
162	Suicide by crushing	2	.....
163	Other suicides	2	.....
165	Other acute poisonings	8	18
166	Conflagration	28	15
167	Burns (conflagration excepted)	81	70
168	Absorption of deleterious gases (conflagration excepted)	55	30
169	Accidental drowning	53	58
170	Traumatism by firearms	3	4
171	Traumatism by cutting or piercing instruments	7	5
172	Traumatism by fall	163	178
174	Traumatism by machines	27	13
175	Traumatism by other crushing (vehicles, railways, landslides, etc.),	197	150
176	Injuries by animals	3	3
177	Starvation	1	3
178	Excessive cold	6	.....
179	Effects of heat	6	218
181	Electricity (lightning excepted)	6	2
182	Homicide by firearms	12	9
183	Homicide by cutting or piercing instruments	5	3
184	Homicide by other means	13	19
185	Fractures (cause not specified)	15	15
186	Other external violence	24	43
		825	984
	XIV. Ill-defined Diseases.		
187	Ill-defined organic diseases	.....	1
188	Sudden death	11	19
189	Cause of death not specified or ill-defined	30	50
		41	70
	Totals	11,639	11,767

Note.— The above summary includes eight deaths not yet tabulated in the monthly bulletins.

Ages.

	1912.	1911.
Under 2 days	384	363
2 days to 1 week	228	175
1 week to 1 month	259	284
1 to 3 months	398	438
3 to 6 months	405	405
6 to 9 months	295	328
9 months to 1 year	213	255
Infant, age unknown	1	.....
Total under 1 year	2,183	2,248
Total under 5 years	2,994	3,123
6 to 60 years	5,370	5,317
Over 60 years	3,273	3,327
Adults, age unknown	2	.....
All ages	11,639	11,767

Sex.

	1912.	1911.
Males	6,078	6,222
Females	5,560	5,545
Unknown	1	.....

The death rate 16.16 per 1,000 population is the lowest rate Boston ever had. The same may be said of the rates for each of the following diseases: Tuberculosis, diphtheria, typhoid fever and scarlet fever, which had the following rates, respectively, per 10,000 population: 15.18; 1.42; .79; and .44.

Summary of Reported Cases of Principal Communicable Diseases with Corresponding Deaths and Case Fatality.

	1912.			1911.		
	Cases.	Deaths.	Case Fatality.	Cases.	Deaths.	Case. Fatality.
Diphtheria and croup	1,539	102	6.63	2,108	124	5.88
Scarlet fever	1,153	32	2.78	1,527	74	4.85
Typhoid fever	460	57	12.39	500	63	12.60
Measles	5,666	111	1.96	4,251	74	1.74
Tuberculosis	3,322	1,093	32.90	3,137	1,067	34.01
Whooping cough	1,145	75	6.55	1,243	108	8.69

Summary of Rates.

	Mean Annual Rate per 1,000 Persons Living (Excluding Stillborns).											Deaths of Children Under One Year to 1,000 Births (Excluding Stillborns).
	Births.	Deaths.	Smallpox.	Measles.	Scarlet Fever.	Diphtheria and Croup.	Whooping Cough.	Typhoid Fever.	Diarrhea and Enteritis (Under Two Years.)	Diarrhea and Enteritis (All Ages.)	Pulmonary Tuberculosis.	
1881–85	29.71	24.71	.009	.201	.361	1.536	.214	.518	.....	.....	4.079	186.24
1886–90	29.88	23.43	.002	.117	.190	1.204	.154	.389	.....	.....	3.527	177.84
1891–95	31.74	23.54	.009	.039	.367	1.188	.118	.310	.....	.....	2.883	166.86
1896–1900	30.93	21.06	.002	.073	.203	.765	.130	.309	.....	.....	2.423	150.80
1901–05	27.52	18.75	.095	.124	.153	.387	.124	.224	.979	1.112	2.168	138.41
1906–10	27.81	17.88	.0003	.127	.104	.265	.113	.160	.910	1.033	1.757	133.40
1911	26.07	17.08	.001	.107	.107	.180	.156	.091	1.010	1.139	1.549	125.15
1912 (births estimated).	26.39	16.16	.....	.154	.044	.142	.104	.079	.821	.911	1.518	114.89

VOLUME I.—TABLE OF CONTENTS.

PAGE

Prevention of infant mortality by breast feeding 4
Child hygiene 29
Vinegar and vinegar laws 57
Prevention of infant mortality 79
The relation of the foreign population to the mortality rates of Boston . 103
Pasteurization 151
Tenement houses and sanitary inspection 177
The Boston Health Department 203
Smallpox and vaccination 251
Food inspection 303
Regulations:
  Communicable diseases 155
  Burials 254
Vital statistics (monthly) 10, 37, 60, 85, 132, 157
182, 207, 227, 256, 279, 310
Monthly reports . 22, 50, 72, 96, 144, 166, 192, 216, 238, 266, 290, 321
Provisional Summary of Vital Statistics for the year 1912 compared with 1911 331